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THE EXTENT OF DRUG USE IN METROPOLITAN TORONTO SCHOOLS: A STUDY OF CHANGES FROM 1968 TO 1970

THE ADDICTION RESEARCH FOUNDATION

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PREFACE

The survey reported in this study is the second of a series of investigations of the nature and extent of drug use. This survey was planned by Dr. R. G. Smart and Mrs. Dianne Fejer of the Addiction Research Foundation. The data were collected and analyzed for the Foundation by David Jackson and Associates.

Requests for copies of this report should be addressed to the Research Division, Addiction Research Foundation, 33 Russell St., Toronto, Canada.

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Introduction

The extent of drug use among adolescents in Canada has been under investigation for a number of years. Smart and Fejer (1969) recently published a review of the relevant studies but since that time a number of others (e.g. Russell, 1970; Smart, Fejer and Alexander, 1970) have appeared. From the Smart and Fejer review it was obvious that almost all studies were of a single population at one point in time.[1] Of course, this makes it impossible to assess trends in drug use. The present study is an effort to re-examine high school students (grade 7 to 13) which were studied in 1968 (Smart and Jackson, 1969). The 1968 study utilized two methods of estimating drug use, one based on students reporting their own use and one on their reporting others' drug use. Since these two methods gave similar results considerable confidence can be maintained in the data.

An important aim in this study is to determine whether drug use in general has increased and whether particular drugs are more, or less frequently used. A further aim is to see whether social and demographic variables, found in 1968 to be important, are still associated with drug use. It was found that drug use was related to age, sex, religion, language and other social characteristics and we wished to see whether these relationships continued to be important.

The present study, as well as attempting to replicate earlier findings, introduces some new variables for study. For example, the 1970 study enquires about parental drug use. This topic was investigated in the Niagara Counties study (Smart, Fejer and Alexander, 1970) but not in the 1968 Toronto study. Grade 6 was added in 1970 in order to extend our knowledge of very young drug users and perhaps determine the age of initiation for some drugs.

Also, the present study attempts to relate drug usage to alienation as determined by the Dean Scale (Dean, 1961). This scale has been shown to yield reliable and meaningful measures of three aspects of alienation -

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[1] An exception here are the studies by Campbell (1969) of university students on two occasions.

powerlessness, normlessness and social isolation. A modified form suitable for adolescents had been prepared and was used earlier in a study of adolescent drinking (Blane, Hill and Brown, 1968). Many writers have assumed (e.g. Malcolm, 1970) that illicit drug use is closely associated with alienation. However, no empirical demonstration of this proposition has been made as yet. In this study it was expected that users of illicit drugs would feel themselves to be alienated as measured by the Dean questionnaire.

The general purpose of this study, then, was to replicate a survey conducted among Toronto students in 1968. The specific objectives were to:

1. Determine the incidence of use of various drugs by students in Grades 6, 7, 9, 11 and 13.

2. Measure changes in the rates of drug use and the determinants of drug use which have occurred between 1968 and 1970.

3. Obtain information regarding: demographic characteristics of students and parents; student knowledge about and attitudes toward drug use; parental habits and level of student alienation.

4. Identify the determinants of drug use by relating use patterns to personal, parental and demographic characteristics.

Research Method

Basic Design

The study is essentially a repetition of a survey conducted in 1968 to determine the frequency of student use of tobacco, alcohol, psychoactive drugs, marihuana, LSD, opiates, speed, solvents and other hallucinogens within Metropolitan Toronto elementary and high schools. In the 1968 survey, students from Grades 7, 9, 11 and 13 were sampled. The same or similar classes were resurveyed and a sample of Grade 6 students was added to the original

design. The basic difference between the 1968 study and this study is the addition of Grade 6 students.

Another difference is the use of a single means of data collection. In 1968, group discussions were conducted to assist in the development of the questionnaire and the results of these discussions were analyzed and reported in addition to the data from the questionnaire. All of the data in this report are based on a questionnaire completed by the students in their schools.

The Sample

The sample included those students in each of the classes surveyed in 1968 plus a sample of Grade 6 students. In each school where Grade 7, 9, 11 or 13 classes were surveyed in 1968, a similar number were resurveyed. An attempt was made to return to the same class but in eleven schools the class numbering system had been modified. In these schools classes within each grade were randomly chosen. No attempt was made to resurvey the same students as in 1968 and the same classes were used only to simplify and facilitate the sampling procedure.

The inclusion of the Grade 6 students was based on earlier findings that the incidence of the use of some drugs is relatively high even at the Grade 7 level. Grade 6 classes were randomly selected in those schools where Grade 7 classes were surveyed in 1968. An effort was made to survey the same number of Grade 6 and 7 classes. The total number of Grade 6 students surveyed was 1,932 compared to 1,868 Grade 7 students. In some areas the Grade 6 classes are housed in different schools from the Grade 7 classes. In those cases the Grade 6 classes were randomly selected from among the "feeder" elementary schools.

The 1968 selection of schools was based on the random selection of classes at each level until 120 students in each school district had been chosen. The school districts were generally randomly selected in each Borough. In the case of the City of Toronto, the types of special schools were so numerous that it was necessary to select the classes randomly from a list of all the Grade 7, 9, 11 and 13 classes.

The total sample tested was 8,865 students. Of these, 1,932 were in Grade 6, 1,868 in Grade 7, 1,875 in Grade 9, 1,725 in Grade 11 and 1,422 in Grade 13. An additional 43 students did not indicate their grade.

Letters of Permission

Letters requesting permission for students to participate in the survey were sent to the parents of each student in the classes selected, explaining the general purpose of the study. These letters were translated into Italian, Portuguese, Greek, Polish, Ukrainian and Chinese. Translations and an English copy were given to each student whose parents did not speak English.

The content of the letter used was determined by each school board. Two basic types of letters were used. The City of Toronto, The Metropolitan Separate Schools and North York Boards asked the parents to sign a card signifying that they either did or did not wish their son or daughter to participate in the survey. In the other Boroughs the parent was asked to notify the school if he did not wish his child to participate. If the parent did not notify the school the student was assumed to have permission. In Scarborough the parents of Grade 6 students were required to sign a release.

The type of letter and the degree of interest in and support for the study by school officials and teachers strongly influenced the percentage of students who completed the questionnaire. Participation was also influenced by student support and the level of absenteeism on the day the survey was conducted in each school. (The percentage of students completing the questionnaire is shown in Table 1). The overall completion rate for 1970 was 72% compared with 66% in 1968.

Table 1

RATE OF STUDENT COMPLETION OF QUESTIONNAIRE

SCHOOL BOARD	NUMBER POTENTIAL	NUMBER COMPLETING	PERCENT COMPLETION
A	684	482	71
B	2,789	2,138	77
C	1,068	766	72
D	2,565	1,689	66
E	1,922	1,587	83
F	2,766	1,754	63
G	612	449	73
TOTAL	12,406	8,865	72

Procedure

The questionnaire which appears in Appendix 3 was administered to 399 classes in 94 schools by 30 interviewers. In 14 schools, classes were combined to facilitate scheduling and data collection. In all cases the students marked their answers on an optical scanning sheet. They were instructed not to sign their names or put any identification on the questionnaire on the optical scanning form.

The optical scanning forms were later checked and school, grade and individual codes inserted for identification purposes. The sheets were optically scanned to produce 80 column data cards for processing. The information was transferred from card to tape and analyzed, using the Harvard University Data Text System. Additional Fortran-4 programmes were developed to provide further analysis of the data.

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Data Analysis

The questionnaires were analyzed and the data findings reported in the following sequence. First, the number and percentage of students who selected each of the available responses to each of the first 58 questions were analyzed. Then the remaining 24 questions were combined to provide three sub-measures and one overall measure of alienation. The 58 questions in the first part of the questionnaire elicited information regarding:

a. Demographic characteristics of the students and parents.

b. Family characteristics.

c. Parental use of drugs.

d. Personal use, knowledge about and attitudes toward drugs.

e. Personal social activities.

Selected segments of the data were then cross-tabulated in terms of school district, grade, sex, drug usage, parental drug usage, alienation and family characteristics.

The final step in analysis consisted of a comparison of the present data with 1968 findings. The data have been reported in the following sections in a slightly different order than the analysis was undertaken in order to simplify the presentation of results.

The Prevalence of Drug Use: Comparison of 1968 and 1970 Data

The pattern of drug usage by students in 1970 differs from that found in 1968. The use of alcohol, marihuana, barbiturates, opiates, LSD and other hallucinogens is more widespread than in 1968. The percentage of students reporting the use of tobacco has decreased as has the use of glue, stimulants and tranquilizers. For all drugs there is a statistically significant difference in usage rates between 1968 and 1970.

The percentages of students using each drug in 1968 and 1970 are shown in Table 2. Since the 1970 data includes Grade 6 students while the 1968 sample did not, the frequency of drug usage is also reported for Grades 7 to 13 separately. The data indicate that except for glue and other solvents, the frequency of drug use is lower among all the students sampled in 1970 than among only those from Grades 7 to 13. The inclusion of Grade 6 students in this survey tends to reduce the usage rates. The two exceptions are glue and other solvents because the Grade 6 students were the highest users of these types of drugs.

If we compare the Grades 7 to 13 students in 1970 with those surveyed in 1968, we observe a doubling or more in the percentage of students using marihuana,[1] opiates, LSD and other hallucinogens such as STP. The percentage of students using marihuana in 1970 is 273% of what it was in 1968. Similarly, the percentage of students using other drugs in 1970, when expressed as a percentage of the level of use in 1968, is as follows: opiates 215%, LSD 327% and other hallucinogens 335%. Since data were not collected in 1968 for speed or solvents other than glue, one cannot determine whether use has increased or not. Alcohol, by far the most widely used drug, is now used by approximately one-third more students than in 1968. The percentage of students using tobacco has dropped slightly from 37.6% to 35.5%.

The use of psychoactive drugs, including barbiturates, stimulants and tranquilizers appears to be relatively stable.

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[1] As in the 1968 report, hashish was considered as synonymous with marihuana.

Table 2

PREVALENCE OF DRUG USE AMONG TORONTO STUDENTS IN 1968 AND 1970

	% Using In Last 6 Months		
	1968 Gr. 7-13	1970 Gr. 7-13	1970 Gr. 6-13
Alcohol	46.3	60.2	53.1
Tobacco	37.6	35.5	30.4
Marihuana	6.7	18.3	14.5 ←
Glue	5.7	3.8	4.1
Other Solvents	*	6.3	7.2
Barbiturates	3.3	4.3	3.8
Opiates	1.9	4.0	3.5
Speed	*	4.5	4.1
Stimulants	7.3	6.7	5.8
Tranquilizers	9.5	8.8	7.6
LSD	2.6	8.5	7.2
Other Hallucinogens	2.0	6.7	6.4
Total Students	6,447	6,890	8,822

* Data not collected in 1968

although use of the latter two has decreased slightly. The incidence of illicit drug use has increased substantially. This includes alcohol, marihuana, opiates, LSD and other hallucinogens. Alcohol can be included among the illicit drugs because only 1.8 percent of the 1970 sample are 20 years of age or over while the legal drinking age in Ontario is 21 years.

Frequency With Which Students Use Drugs

If one compares the Grade 7 to 13 students in 1968 and 1970, those drugs which show a dramatic increase in the proportion of users also show a substantial increase in the frequency with which the students are using them. For alcohol, marihuana, LSD, the proportion of heavy users is significantly greater than in 1968. The percentage of students using marihuana 1 to 2 times in 1968 was 2.8% but in 1970, 6.2% of the students had used marihuana 1 to 2 times. However, in the 7 or more times category, the percentage of users had increased from 1.9% in 1968 to 7.3% in 1970. In other words, infrequent marihuana users have doubled but heavy users have more than tripled in the two year period. The relationship was the same for LSD. The infrequent (1-2 times) users of alcohol increased by about 14% from 1968 to 1970 but the heavy (7+ times) users increased by 41%.

There was little change in the proportions of light and heavy users of psychoactive drugs (tranquilizers, barbiturates and stimulants) from 1968 to 1970. Tobacco and glue showed a slight decline in the proportion of heavy (7+ times) users between the two surveys.

For solvents and speed there is no data available for 1968. The 1970 survey, however, showed that by far the majority of students using solvents did so infrequently. About 5% of the students used solvents 1 to 2 times in the 6 month period while only 0.7% used them 7 or more times. The majority of speed users also had only taken it 1 or 2 times but the proportion of heavy users (7+ times) was greater than for solvents.

Drug Use By Demographic Characteristics

Drug Use and District

There are significant variations in the level of drug usage among districts for all drugs. There have been very spectacular changes within some districts between 1968 and 1970 in the use of drugs. Almost eight times as large a percentage of the students in District 4 reported using marihuana and six times as large a percentage reported using LSD as in 1968. In district 16 the reported use of glue declined from 13.3 to 4.8 percent. Part of the variation may be due to differences in the parental permission form used in different schools. Since there is no desire to identify individual schools, districts or boroughs, the differences in parental approval will not be related to specific school districts.

Drug Use and Grade

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The use of drugs is closely associated with grade. For solvents and glue, usage peaked at Grade 6 or 7 and decreased sharply for higher grades (Figure 1). Alcohol was unique in that the curve increased continuously from Grade 6 to Grade 13 (Figure 2). The percentage of students using each of the other drugs except stimulants increased from Grade 6 to Grade 11 and then decreased slightly at Grade 13 (Figures 2, 3 and 4). For stimulants the peak use occurred in Grade 9.

A comparison with the 1968 data indicates that the peaks have shifted from Grade 9 to Grade 11 for most drugs. The major difference is that in 1968 only tobacco and barbiturates peaked at Grade 11 while marihuana, stimulants, glue, opiates and other hallucinogens peaked at Grade 9. Another difference is that tranquilizer use in 1968 was higher in Grade 13 than in Grade 11 while in 1970 the percentage reporting using this drug was almost the same. (Table 3).

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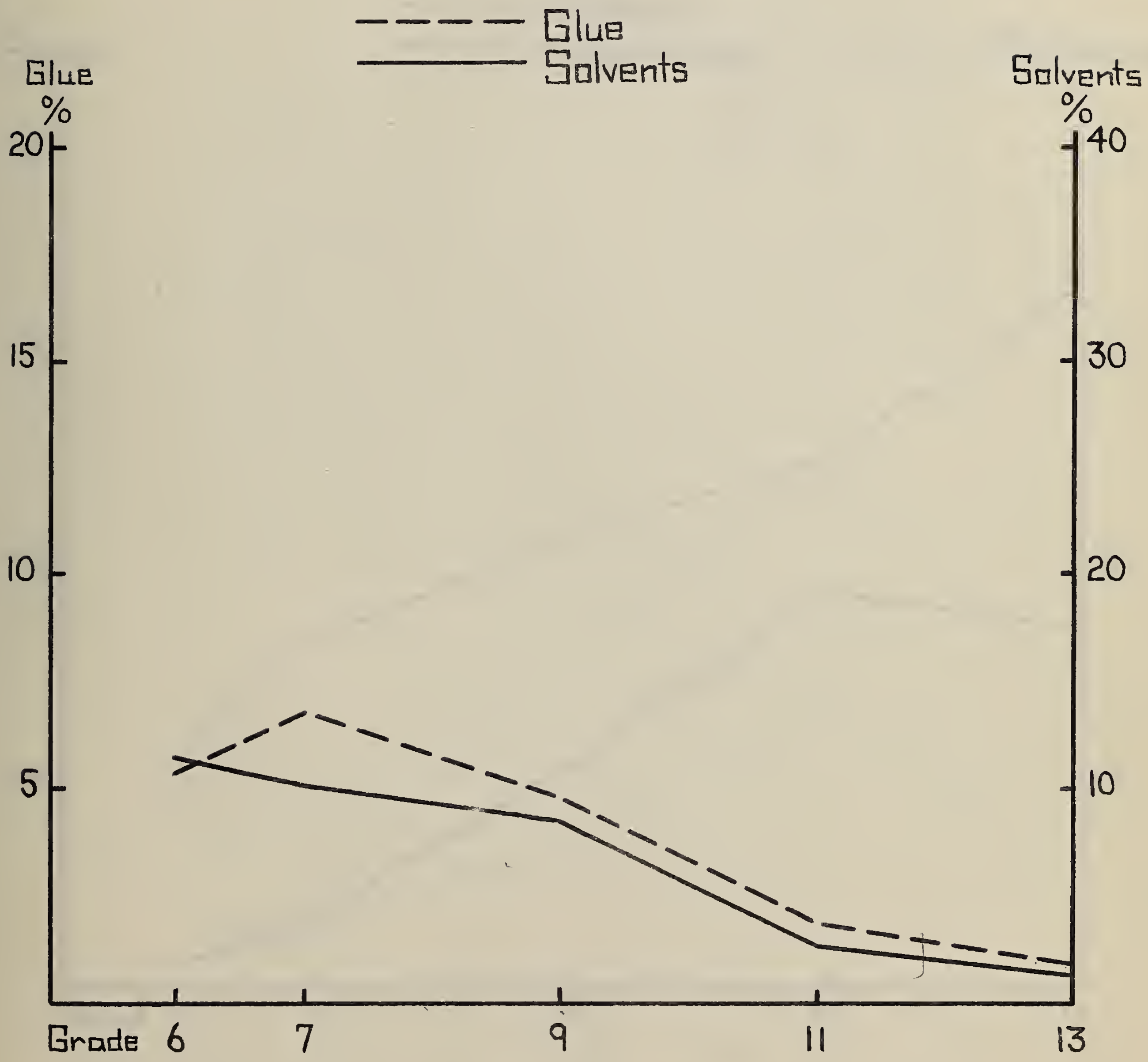
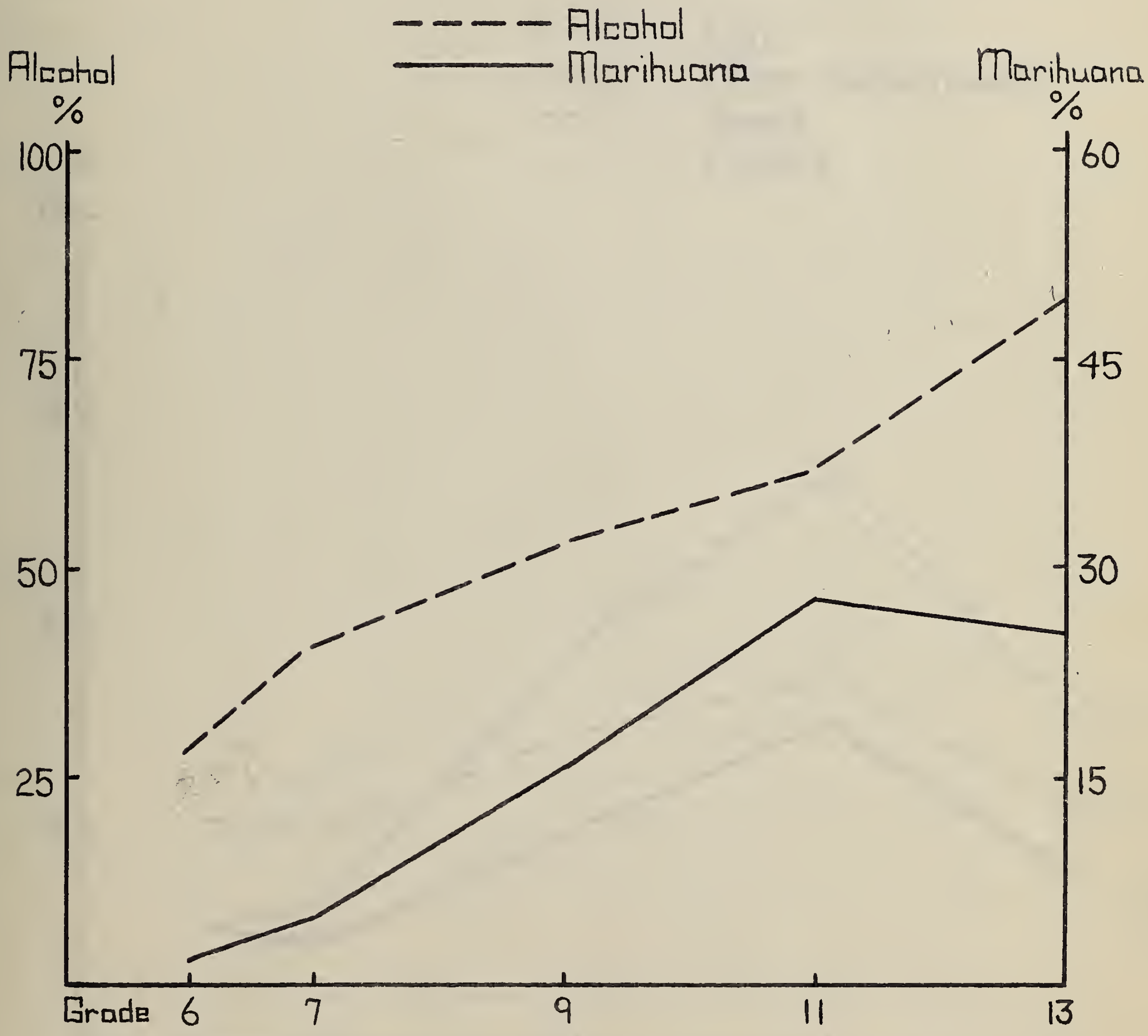
Figure 1: Use of Glue and Solvents by Grade.



[illegible]

Figure 2: Use of Alcohol and Marihuana By Grade.



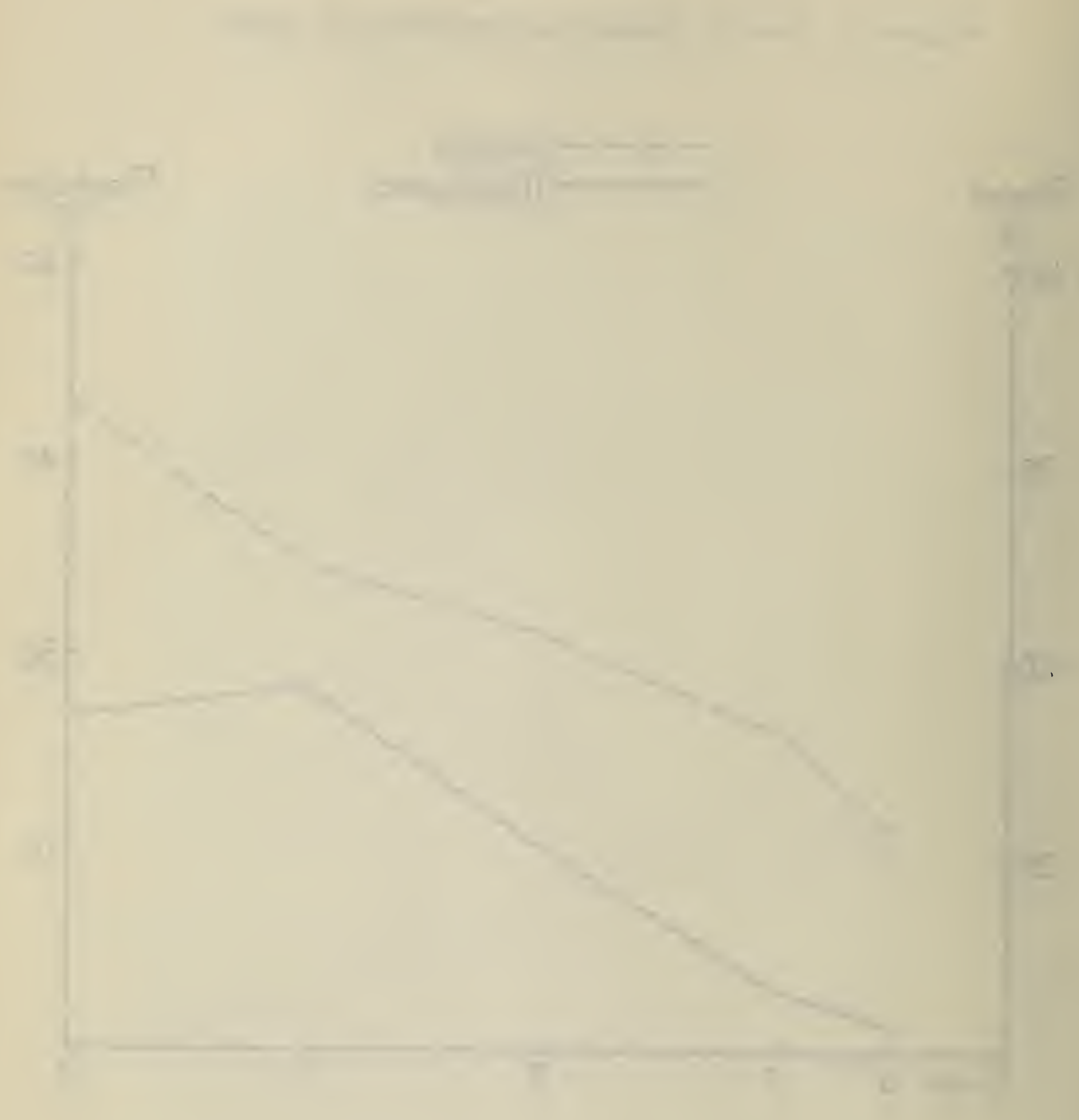


Figure 3: Use of Illicit Drugs by Grade.

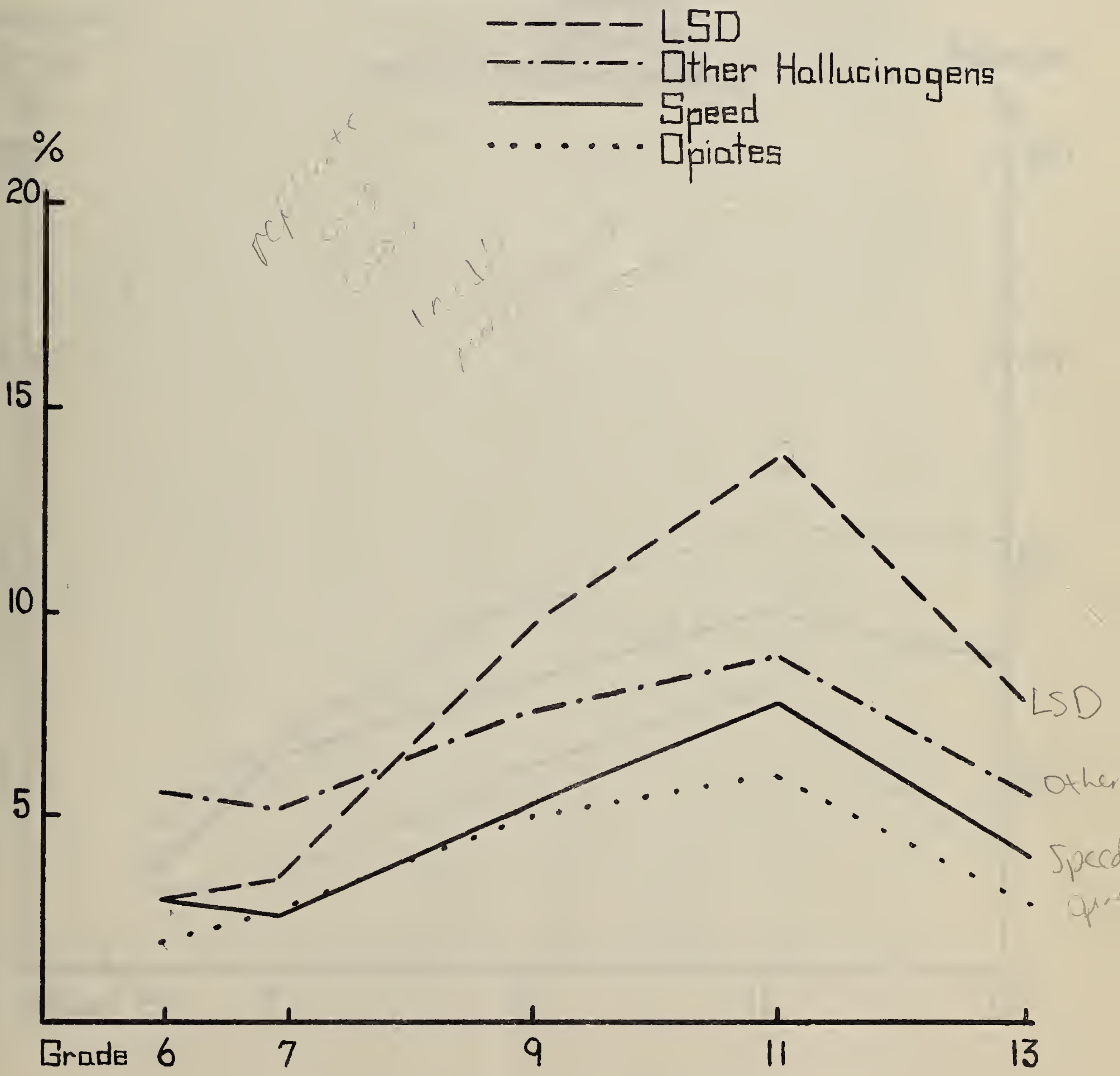


Figure 4: Use of Psychoactive Drugs by Grade.

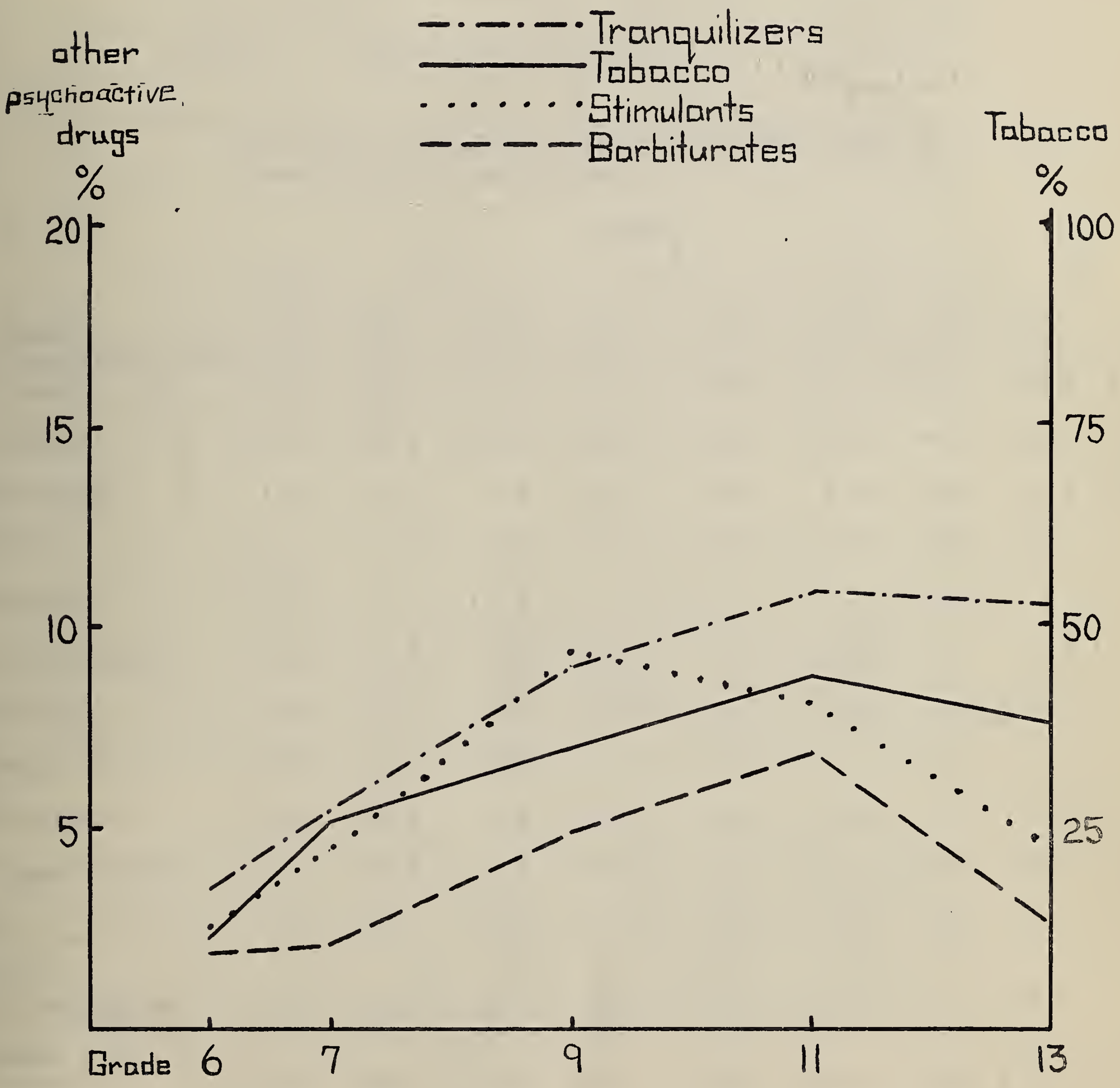


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Table 3

DRUG USE AND GRADE

Percent of Students Reporting Using Drugs At Least Once in Past 6 Months

Grade

	11	12		14		16		18	
	6	7		9		11		13	
DRUGS	1970	1968	1970	1968	1970	1968	1970	1968	1970
Alcohol	27.7	22.9	39.5	41.6	53.9	59.7	71.5	70.9	82.3
Tobacco	12.3	24.6	26.0	44.3	35.1	46.6	44.0	39.7	38.0
Marihuana	1.1	2.6	5.6	10.8	15.9	8.9	28.1	7.5	26.2
Glue	5.4	7.2	6.8	9.4	4.9	2.6	1.7	0.7	0.8
Solvents	10.7	-	10.0	-	8.7	-	3.5	-	1.5
Barbiturates	2.1	1.3	2.3	3.9	5.1	4.4	7.0	3.8	2.7
Opiates	1.8	1.1	2.5	3.0	4.7	1.8	5.8	1.0	2.8
Speed	2.5	-	2.5	-	5.2	-	6.7	-	3.7
Stimulants	2.8	4.3	4.6	9.4	9.3	7.8	7.9	5.6	4.6
Tranquilizers	3.5	4.8	5.4	11.4	9.0	11.6	10.8	14.6	10.4
LSD	2.6	1.1	3.4	3.9	9.5	2.1	13.4	3.8	7.6
Other Hallucinogens	5.3	1.0	5.1	3.1	7.5	1.9	8.7	0.9	5.5
Number of Students	1,932	1,816	1,868	1,752	1,875	1,733	1,725	1,146	1,422

From the data on grade it is also possible to determine which grade levels have contributed most to the increase or decrease in the use of various drugs from 1968 to 1970. The increase in the prevalence of marihuana smoking has involved primarily the students in Grades 11 and 13. Marihuana use went up 5.1% in Grade 9 from 1968 to 1970 but increased by 19.2% in Grade 11 and 18.7% in Grade 13. The increase in the use of LSD was mainly among Grade 11 students. Use increased by about 10% from 1968 to 1970 and a similar trend was found for other hallucinogens.

The increase in the use of alcohol involved primarily the Grade 7 students among whom use had increased by almost 17%. Grade 13 students also contributed to the increase in alcohol use: the percentage of users went up about 11%. Grade 9 students were mainly responsible for the overall decrease in tobacco use. For other drugs the changes which occurred between 1968 and 1970 in the prevalence of use tended to be spread over the various grades.

Drug Use and Sex

The use of most drugs is sex influenced. A greater proportion of males use drugs than females and males use drugs more frequently than females. This applies to all drugs except barbiturates, stimulants, solvents and tranquilizers. Females use significantly more tranquilizers while there is no sex difference in the level of use of solvents, barbiturates and stimulants.

The rate of increase in the proportion of females using various drugs appears to be higher than for males in the period from 1968 to 1970. For example, the percentage of males using alcohol increased by 4.7% while the percentage of female alcohol users increased by 9.2%. The decrease in users of tobacco was 10.7% for males compared to 4.4% for females. The percentage of males using stimulants decreased by 3.0% while the percentage of females using this drug increased by .3%.

The use of illicit drugs by females has also increased at a higher rate than for males. The percentage of females reporting using marihuana almost tripled from 4.1 to 12.0% compared to a doubling by males. The male rate is still higher at 16.9% but the difference is becoming smaller. A similar pattern is observed for LSD and other hallucinogens.

Much of the overall increase in drug usage from 1968 to 1970 may be due to the higher rate of increase in drug use by the female students. Drug usage may be passing from a stage at which males tended to be the primary users to a stage where usage is independent of sex. This pattern is consistent with the general cultural trend toward sexual equality and the acceptance of similar standards for males and females.

Drug Use and Age

The use of all drugs is significantly related to age but the direction of the relationship varies from drug to drug. The use of glue and other solvents decreases as age increases. The proportion of users of barbiturates reaches a peak among 14-16 year old students and then decreases while the use of opiates follows a similar pattern but peaks among 17-19 year old students. For most of the other drugs the percentage of students reporting using the drug once during the previous six months increases with age.

Table 4

DRUG USE AND SEX

DRUGS	MALES 1968	MALES 1970*	FEMALES 1968	FEMALES 1970*
Alcohol	51.7	56.4	40.4	49.6
Tobacco	43.1	32.4	32.7	28.3
Marihuana	8.6	16.9	4.1	12.0
Glue	7.4	4.7	4.6	3.5
Solvents	-	6.8	-	7.7
Barbiturates	3.7	3.8	3.6	3.8
Opiates	2.3	4.1	1.6	2.9
Speed	-	4.7	-	3.4
Stimulants	8.7	5.7	5.6	5.9
Tranquilizers	8.3	6.2	10.4	8.9
LSD	5.6	8.4	1.3	5.9
Other Hallucinogens	3.2	7.0	1.6	5.7
Number of Students	3,298	4,395	3,097	4,453

* Grade 6 Students included in 1970 data.

Social Determinants of Drug Usage

In this section, a number of factors related to drug use are discussed. Since the 1968 study indicated the use of drugs cannot be explained by a single factor or determinant, several demographic and social variables were studied.

The general approach has been to consider the influence on student drug usage of the family environment, the school environment, the peer group and personal experiences. The social relationships which occur within the family, school and peer environments strongly influence drug use. While the analysis does not provide a measure of the relative importance of these three environments or allow statements of causality it does provide considerable information on factors related to drug usage.

Unfortunately, a detailed comparison between 1968 and 1970 on the determinants of drug use cannot be made. In 1968 cross tabulations were made between a general drug use question and the social and demographic variables rather than cross tabulating them with the individual drugs as has been done in 1970. However, in 1968 this general drug use question was cross tabulated with the individual drugs. It was found that 89.1% of these students who stated they "have used drugs" were marihuana users. Therefore the 1968 data on drug use and social determinants will be compared primarily with the data on marihuana use and social determinants in 1970.

The Family Environment

Ethnic Origin

The place of birth of both the student's mother and father were found to be significantly related to the use of several drugs. Approximately the same numbers of fathers as mothers were born in the five geographic areas considered. These are North America, Western Europe, Eastern Europe, United Kingdom and Other which includes Asia, Africa, Australia and South America.

There is a high degree of similarity between the drug use patterns of students when cross tabulated by both mother's and father's place of birth.[1] Student use of barbiturates, opiates, speed and tranquilizers was not significantly related to the place of birth of either parent. The use of LSD was related to the birth place of the father but not of the mother. The usage of the other seven drugs was related to the place of birth of both parents.

Alcohol usage was most common among students whose parents were born in Eastern Europe and lowest for those born in Asia, Africa, Australia or South America. For example, 66% of the students whose mothers were born in Eastern Europe reported using alcohol compared to 44% of those whose mothers were born in Asia, Africa, Australia or South America. Fewer children of West European parents reported smoking than those from the four other geographical areas. One quarter of the children of West European parents

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[1] Cross tabulations were constructed and X^2 calculated for each of the variables and the level of usage of each of 12 drugs. The tables presented show the percentage of students reporting using each drug at least once during the past six months, but rates of use have not been included. To do so would increase the number of tables by a factor of 12.

reported using cigarettes compared to one third of the children of North American born parents. The students whose parents were born in North America reported the highest rates of tobacco usage.

Marihuana is used by a higher proportion of students whose parents were born in Eastern Europe and the United Kingdom than in the three other areas. Students whose fathers were born in Eastern Europe are the heaviest users with 11.9% reporting using marihuana three or four times in the past six months. By comparison, only 5.6% of the students whose fathers were born in Western Europe reported a similar rate of marihuana use. In 1968 the highest proportion of drug users (primarily marihuana users) was found among those students whose parents were born in the United Kingdom. However, unlike those in 1970, students of parents born in Eastern Europe were the least likely to use marihuana.

The children of parents born in Western Europe are the least likely to use stimulants and are the least likely to be heavy users. For example, 4.8% of the children of Eastern and Western European fathers reported using stimulants compared to 7.4% of the children of fathers born in the United Kingdom. High levels of stimulant use are reported by students whose mothers were born in North America and in Asia, Africa, Australia or South America and by students whose fathers were born in North America and in Asia, Africa, Australia or South America and by students whose fathers were born in the United Kingdom. The students most likely to use solvents are those whose parents were born in the United Kingdom or Asia, Africa, Australia and South America. Those least likely to be users and the most infrequent users were the children of North American born parents.

The pattern of parental influence on student use of LSD and other hallucinogens is relatively comparable. Children of Western European parents are least likely to use these drugs and least likely to be heavy users if they do use them. More children of parents born in the United Kingdom use these drugs and they also tend to be the ones most likely to take them three or more times per month.

Religion

The religious background of a student's family appears to influence whether or not he uses some drugs and the degree of use of these drugs. Religion appears to be one of several interacting factors but not a primary determinant. For five drugs, namely glue, opiates, speed, stimulants and tranquilizers, a statistically significant relationship was not found between their use and their family religion. Significant relationships were found for the other seven drugs but the relationship varies among these drugs.

The majority, 51.9% of the students, reported their family religion as Protestant; 30.2% reported being Catholics; 9.0% claimed No Religion or I Don't Know; 2.7% said Jewish and 5.9% said they were Other. These percentages do not differ substantially from those reported by the students in 1968. The groups most likely to use alcohol and to report greatest usage were the Jewish students and those reporting No Religion. Those who claimed Other as their religion were least likely to use alcohol and if they did drink, reported doing so less often than the rest of the students. The same general relationship as reported for alcohol also held for tobacco, marihuana and barbiturates.

Marihuana use was higher among Jewish students and those students having no religion than among Catholics or Protestants. The figures were Jewish 27.5%, No Religion 18.9%, Protestant 13.9% and Catholic 13.5%. This is reasonably consistent with the results from 1968. In the earlier study the proportion of students of no known religion was highest at 18.9% followed by Jewish students at 14.6%. Marihuana use among Catholic and Protestant students was very much lower. X

Not only were the Jewish students more frequently marihuana users than students from the other religious groups, they were also heavier users. About 16% of the Jewish students reported using marihuana five or more times during the previous six months compared to 6.7% of both Protestants and Catholics. X

The students most likely to use LSD and other hallucinogens were those who reported No Religion. The students who claimed Other as their family religion were the least likely to use LSD or other hallucinogens. The most frequent users were found to be Jewish students and those with no religion. Those claiming to be Other or Protestant were the least likely to be heavy users. The use of solvents was reported by 8.8% of the Catholic students compared to 6.1% of the Protestant students. The Catholics were also over-represented among heavy users while Jewish students were under-represented.

Living Arrangements

The circumstances under which the student lived was found to be associated with his drug usage. For all drugs a statistically significant relationship was found between drug usage and living arrangement.

For all drugs studied, except opiates and other solvents, a smaller proportion of the students who lived with both parents reported using drugs than students who lived with only one parent or with someone else. The general pattern was for drug usage to become more common as one moved from situations in which the student lived with both parents, to mother only, to father only, to living with sister, aunt, uncle, alone etc. The frequency of drug usage among users tended to follow the same pattern. An exception was the pattern of usage for tranquilizers. The percentage of students using tranquilizers was higher for those living with their mother only, 11.6%, than for those living with their father only, 10.0%, or both parents, 7.0%. This suggests that some drugs are sex linked. It is consistent with findings that almost three times as many mothers as fathers use tranquilizers (see questions 20 and 21 of Appendix 1) and that a higher proportion of female than male students use tranquilizers, Table 4.

These findings suggest that the more stable the home environment the less likely students are to be drug users. Drug use is usually considerably more common among students who do not live with either parent than among those who live with both parents. For example, 29.3% of the students who live with both parents smoke, compared to 46.4% who do not live with a parent. The data available for 1968 is not directly comparable to the data for 1970. The question on living arrangements used in 1970 was a combination of two questions used in 1968. However, drug use in 1968 also tended to be more common among those students living with only one parent, living with relatives, friends or alone than among those living with both parents. Students living with only their fathers were also over-represented among drug users.

Parental Work Situation

The type of job held by the father is an indication of the family's socio-economic status. For seven drugs, namely alcohol, marihuana, opiates, barbiturates, stimulants, LSD and other hallucinogens, a relationship was found between the type of job held by the father and student use of drugs. The father's job is not significantly related to the frequency of use of tobacco, glue, other solvents, tranquilizers and speed.

The children of professionals are more likely to use drugs than those whose parents hold proprietor, skilled, semi-skilled or clerical jobs (see Table 5). This relationship is most evident for alcohol, tobacco, marihuana, opiates and LSD. In addition, children of professionals report the highest rate of drug usage. For example, 19.3% of the children of professionals report using alcohol three times per month or oftener compared to 13.4% of the children whose fathers hold clerical jobs.

The percentage of students reporting that they have used a given drug during the previous six months tends to increase in the following order:

Table 5

STUDENT DRUG USAGE BY FATHER'S TYPE OF WORK

	Professional		Proprietor		Clerical		Skilled		Semi-Skilled			Total	
	Students Reporting Using Each Drug At Least Once During Last 6 Months.												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	1763	56.9	297	53.8	705	48.8	981	52.9	915	50.4	33	4691	52.9
Tobacco	994	32.1	173	31.3	408	28.2	573	30.9	520	28.6	21	2689	30.3
Marihuana	562	18.2	82	14.9	160	11.1	253	13.6	212	11.7	13	1282	14.5
Glue	112	3.6	24	4.3	48	3.3	101	5.4	74	4.1	6	365	4.1
Other Solvents	199	6.4	41	7.4	93	6.4	164	8.8	137	7.5	6	640	7.2
Barbiturates	125	4.0	16	2.9	42	2.9	83	4.5	69	3.8	4	339	3.8
Opiates	132	4.3	14	2.5	41	2.8	68	3.7	50	2.8	6	311	3.5
Speed	139	4.5	19	3.4	42	2.9	84	4.5	73	4.0	4	361	4.1
Stimulants	200	6.5	26	4.7	75	5.2	112	6.0	95	5.2	7	515	5.8
Tranquilizers	256	8.3	36	6.5	87	6.0	161	8.7	125	6.9	7	672	7.6
LSD	265	8.6	38	6.9	76	5.3	137	7.4	113	6.2	6	635	7.2
Other Hallucinogens	225	7.3	25	4.5	87	6.0	125	6.7	100	5.5	5	567	6.4

children of clerical workers, children of semi-skilled workers, children of skilled workers and children of professionals. The students whose fathers are proprietors do not follow a regular pattern of drug use. For drugs such as alcohol and marihuana, a relatively high proportion of the latter reported drug usage. Fewer of the children of proprietors than those of any of the other four occupational groups reported using stimulants and other hallucinogens. In 1968 the proportion of drug users was highest among those students whose fathers were employed in proprietorial and professional positions. The relationship between fathers' occupation and drug use in 1968 is very close to the relationship between fathers' occupation and marihuana use in 1970. The only difference is students whose fathers were proprietors are slightly more over-represented among drug users in 1968.

The children of men who hold part-time jobs appear to be less likely to use alcohol than the children of those who work during the day, work shifts or do not work. By contrast, the tendency to use glue, other solvents and LSD is highest among students whose fathers hold part-time jobs. Opiates are used by a higher proportion, 5.6%, of students whose fathers are unemployed. The time at which the father works is not significantly related to the incidence of use of tobacco, marihuana, barbiturates, stimulants or other hallucinogens.

In 1968 there was a significant relationship between when the father worked and drug use by the student. Drug users (mainly marihuana users) were over-represented among students whose fathers were unemployed. The lowest level of drug use was found among students whose fathers worked during the daytime. Again, the relationship for marihuana use and fathers' working hours was not significant in 1970.

Whether or not mother works and the time at which she works is significantly related to usage of alcohol, tobacco, glue, other solvents and other hallucinogens. The tendency to use these drugs increases as one considers students whose mothers do not work, work part-time, work days and work shifts. These findings suggest that drug

usage is related to the degree of disruption within the home produced by mother's working. The same pattern, while not statistically significant, also exists for LSD, and a similar but not identical pattern exists for tobacco, speed and opiates. In 1968 there was no significant relationship between mother's working hours and drug use by her child.

The relationship between the working hours of either parent and drug use by the child is inconsistent. There does not appear to be a continuous pattern from 1968 to 1970, therefore the working hours of mother or father is a poor predictor of student drug use.

Family Use of Drugs

The pattern of drug use by siblings and parents was found to strongly influence student drug usage. The more that drugs are used by other members of the family, the more likely students are to be users of all of the drugs studied.

Sibling Drug Use

Student usage of all 12 drugs was significantly related to reported use of marihuana and/or glue by siblings. A cumulative effect was observed for nine of the drugs studied. If his siblings used both marihuana and glue, a student was more likely to use barbiturates, glue, other solvents, opiates, speed, stimulants, tranquilizers, LSD and other hallucinogens than if his siblings only used one of them.

Students whose siblings used only marihuana were more likely to use alcohol, tobacco and marihuana than those whose siblings used glue or glue and marihuana. In all cases if siblings did not use either marihuana or glue the student was less likely to use any of the 12 drugs.

For example, tobacco usage was reported by 64.4% of the students whose siblings used marihuana but not glue, compared to 23.0% of those whose siblings used neither marihuana nor glue.

Sibling drug usage has a very strong impact on use by students. Only 2.6% of the students whose siblings do not use glue or who do not have a brother or sister reported using glue. By contrast, 19.1% of the students whose brothers or sisters used glue also reported doing so. If their siblings used both glue and marihuana, the percentage reporting using glue increased to 23.1%

Marihuana was used by over half (54.8%) of the students whose siblings reported using marihuana. It was also used by almost half (49.7%) of the students whose siblings used both marihuana and glue. Only 8.2% of those students whose siblings used neither marihuana nor glue reported using it. These results are consistent with those found in 1968 in that drug use by the student is closely related to marihuana and glue use by the siblings. In 1968, 36.6% of those students whose siblings used marihuana were themselves using drugs, mainly marihuana, while 56.8% of those students whose siblings were using both marihuana and glue were also using drugs.

Parental Drug Use

Estimates of parental use of alcohol, tobacco, stimulants, tranquilizers and barbiturates were acquired from the students. The percentage of parents using each of these drugs and also the percentage of students using the same drugs are presented in Table 6. For each parental drug use category a Don't Know category was included. The proportion of students replying they did not know was very low for alcohol and tobacco; for the psychoactive drugs it ranged between 15% and 19%.

Table 6

STUDENT REPORTS OF PERSONAL AND PARENTAL DRUG USAGE

Students Reporting Using Each Drug At Least Once During Last 6 Months

	By Self		By Mother	By Father
	Females	Males		
DRUGS	%	%	%	%
Alcohol	49.6	56.4	43.1	59.0
Tobacco	28.3	32.4	36.0	58.1
Barbiturates	3.8	3.8	13.5	6.7
Stimulants	5.9	5.7	5.7	2.1
Tranquilizers	8.9	6.2	14.9	7.6
Total Students	4453	4395	8865	8865

The data indicate that students are more likely to drink alcohol than their mothers but less likely to drink than their fathers. Tobacco and barbiturates are used by a larger percentage of both mothers and fathers than by sons or daughters. Fathers are relatively less likely to use stimulants than any of the other drugs but mothers are more likely to use tranquilizers.

The use of alcohol and tobacco appears to be male linked while tranquilizer use is female linked.

In general, the percentage of students reporting using drugs is lowest if mother uses neither tobacco nor alcohol and highest if she uses both. The use of either tobacco or alcohol by the mother increases student use, with alcohol usually exerting a greater influence than tobacco.

Mothers' use of tobacco influences student use of glue and other solvents more than does her use of alcohol.

Mothers' and fathers' use of tranquilizers, stimulants and barbiturates was cross-tabulated with the students' use of 12 drugs. For all twelve drugs a statistically significant relationship was found which indicated that student use of all drugs increased as parental use increased. In other words, when parents were frequent drug users their children tended also to be drug users. When parents were infrequent drug users or non-users their children were usually non-users.

The relationship between student drug use and parental drug use may be illustrated by examing mothers' use of tranquilizers. It will be recalled that tranquilizers were more frequently used by mothers than any of the other psychoactive drugs. Mothers who use tranquilizers are much more likely to have children who use one or more of the 12 drugs than are mothers who don't use tranquilizers. The proportion of students using a particular drug also increases as the mothers' rate of use increases.

When the mother uses tranquilizers every day her children are twice as likely to use marihuana and LSD as the mother who does not use tranquilizers. Her children are about three times as likely to use glue or other solvents, four times as likely to use opiates, speed, stimulants and other hallucinogens, 5 times as likely to use barbiturates, and about 8 times as likely to use tranquilizers. A similar pattern is also found for fathers who use tranquilizers and for mothers and fathers who use stimulants and barbiturates. (Table 7)

If the data is viewed from the point of view of student drug use the relationship with parental drug use is also striking. The students using marihuana reported that 29.3% of their mothers used tranquilizers and 15.9% of their fathers used tranquilizers, 27.0% of their mothers used barbiturates and 15.9% of their fathers used barbiturates. The percentage of marihuana users whose parents used stimulants was much lower. The relationship between LSD use by the student and the use of psychoactive drugs by the parent was almost identical to that found for marihuana. For speed, opiate and other hallucinogen users, the proportion of their parents using psychoactive drugs was greater than for marihuana and LSD.

Mariju

marijuana

Table 7

STUDENT DRUG USAGE BY MOTHER'S USE OF TRANQUILIZERS

	Rate of Mother's Use												
	Never		Once Per Month		Once Per Week		Once Per Day		Don't Know			Total	
	STUDENTS REPORTING USING EACH DRUG AT LEAST ONCE DURING LAST 6 MONTHS												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	2999	50.2	486	68.1	240	71.6	186	70.5	749	49.5	34	4694	52.9
Tobacco	1637	27.4	286	40.1	138	41.2	131	49.6	476	31.4	21	2689	30.3
Marihuana	767	12.8	141	19.7	98	29.3	76	28.8	192	12.7	8	1282	14.5
Glue	182	3.0	34	4.8	31	9.3	26	9.8	86	5.7	6	365	4.1
Other Solvents	343	5.7	56	7.8	45	13.4	39	14.8	149	9.8	8	640	7.2
Barbiturates	167	2.8	35	4.9	33	9.9	35	13.3	64	4.2	5	339	3.8
Opiates	167	2.8	31	4.3	30	9.0	29	11.0	47	3.1	7	311	3.5
Speed	195	3.3	45	6.3	27	8.1	25	9.5	61	4.0	8	361	4.1
Stimulants	256	4.3	69	9.7	48	14.3	41	15.5	93	6.1	8	515	5.8
Tranquilizers	262	4.4	115	16.1	97	29.0	82	31.1	108	7.1	8	672	7.6
LSD	374	6.3	66	9.2	46	13.7	39	14.8	105	6.9	5	635	7.2
Other Hallucinogens	314	5.3	55	7.7	43	12.8	42	15.9	105	6.9	8	567	6.4

The strongest relationship between student drug use and parental drug use was found when both student and parent were using the same drugs, namely tranquilizers, stimulants and barbiturates. For example, when the students were tranquilizer users, 55.7% of their mothers and 36.3% of their fathers used tranquilizers. Similarly when the students used barbiturates, 43.7% of their mothers and 23.3% of their fathers used barbiturates. (Table 8)

It is clear that student drug use is closely associated with parental drug use, as reported by the students. The findings of this survey also show very similar patterns, regarding parental and student drug use, to those of the Niagara Counties survey (Smart, Fejer and Alexander, 1970). In the Niagara Counties survey the same questions on parental drug use were asked.

The School and Peer Environment

Overall Subject Average

A statistically significant relationship was found between overall subject average and usage of all 12 drugs. For all drugs except alcohol and tobacco, the tendency to use drugs and the rate of drug use decreased as the student's subject average increased. The same pattern, a decrease in drug use with an increase in grade average, was found in 1968. The use of alcohol and tobacco was more common among students who had an average from 51 to 65 than among those with failing grades. It is impossible to determine from the data whether the use of drugs produces lower grades or whether students who tend to get lower grades are predisposed to be heavy drug users.

Participation in School Activities

A significant relationship was found between the number of school activities in which students participated and drug usage for all 12 drugs. The percentage of students

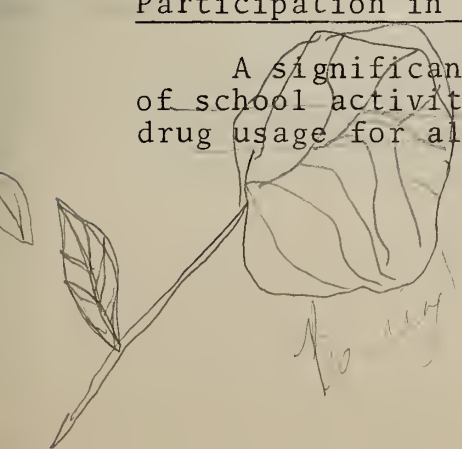

Table 8

PERCENTAGE OF STUDENT DRUG USERS REPORTING PARENTAL USE OF TRANQUILIZERS, BARBITURATES AND STIMULANTS

	Percentage of Students Who Report:					
Drug Used by Students	Mother Uses Tranquilizers	Father Uses Tranquilizers	Mother Uses Stimulants	Father Uses Stimulants	Mother Uses Barbiturates	Father Uses Barbiturates
Alcohol	23.4	12.2	10.2	6.3	22.5	12.1
Tobacco	25.4	13.6	8.6	5.0	20.2	10.8
Marihuana	29.3	17.3	11.5	7.8	27.0	15.9
Glue	34.7	19.2	21.3	22.4	29.6	19.0
Other Solvents	29.8	15.3	18.6	15.5	26.9	16.4
Barbiturates	41.8	24.6	24.9	20.8	43.7	23.3
Opiates	38.6	24.7	21.2	20.4	34.8	23.0
Speed	34.9	19.4	16.3	14.0	32.5	18.1
Stimulants	39.9	25.0	26.1	20.5	38.0	22.0
Tranquilizers	55.7	36.3	21.7	16.1	39.2	24.4
LSD	29.8	15.4	13.7	9.3	29.3	15.3
Other Hallucinogens	36.9	24.0	18.6	16.3	36.2	21.7
Total Sample of Users and Non-Users	14.9	7.6	5.7	2.1	13.5	6.7

using most drugs decreased as participation in school activities increased. Again, this relationship is consistent with that found in 1968. The use of glue and other solvents followed a different pattern, with the students who participated in three activities being the most likely to report using these drugs.

After School and Weekend Activities

Student drug use is significantly related to how students spend their spare time both during the week and on the weekends. Those who report spending their evenings in organized activities are the least likely to use drugs while those who hang around with friends are the most likely to be drug users. Most drugs follow the same pattern as that observed for marihuana, which is, organized activities 8.7% using, stay home 10.8% using, visit friend 20.2% using, and hang around with group 26.6% using. In 1968 the relationship between week-day evening activities and drug use was very similar: 3.7% of the drug users spent their time in organized activities, 6.5% stayed home, 9.4% visited friends and 22.4% hung around with the group.

Students who stay home to watch T.V., read, etc. on the weekends report very low levels of drug usage while those who go out and hang around with a group of kids, go to parties, dances etc., report quite heavy use. Those who spend their weekends at a friend's house or go out with a friend to movies or dances are intermediate in their drug usage. Drug use appears to be consistently related to social contact with peers. The more time spent in unsupervised activities, the more likely, it appears, that students will consume drugs.

Proof of peer pressure

Its not something there need [illegible] really want [illegible]

Marihuana Suppliers

Half of the students reported they did not know anyone who would give or sell them marihuana, 20% knew one to three suppliers and 29% knew four or more. The usage of each of the 12 drugs studied was significantly related to the number of suppliers known. The data indicate a positive

correlation between these two variables. For example, only 0.8% of the students who did not know any marihuana suppliers used marihuana but 43.0% of those who knew four or more suppliers used marihuana. Drug use also increased with an increase in the number of suppliers in 1968. The direction of causality can not be determined from the present data. Either of the following relationships appear reasonable: a) use of all drugs increases as the number of known marihuana suppliers increases and b) the number of persons known who would supply marihuana increases as usage of other drugs increases.

Reasons For Not Using

The major reason given by students for not using drugs was the danger to their health. Forty-one percent chose this reply compared to 32% who indicated they have other things they enjoy doing. Two percent were concerned that drugs are illegal, 3% were influenced by parental disapproval and 8% indicated drug use. The remaining 14% did not reply. The major factors influencing students to use or not use drugs were information received from television, books or newpapers, 39%, and what friends tell them about drugs, 21.0%. The same information sources which provided the most influence on the decision to use drugs were claimed by students to be those sources from which they learned the most about drugs. Forty-two percent of the students learned most of what they know about drugs from the mass media, 25% from friends, 14% from their church or school and 12% from their family. These findings are consistent with those reported in 1968 and suggest a drug information program should utilize the mass media. The development of effective information programs would require additional information regarding the relative credibility of various sources, which media are utilized the most by students and the type of appeal which is most likely to convince students of the dangers of drug misuse.

#5 remedies

solun

use drugs or media

When First Used

Half the students who use glue reported they first sniffed it in 1969 or 1970. The other half had first

sniffed prior to 1969. The comparable data for marihuana indicate almost two-thirds of the users first did so in 1969 or 1970. It is difficult to estimate whether more students are starting to use these drugs because only slightly less than four months had elapsed in 1970 when the data were collected.

Quitting Experience

Very different results are observed when one considers reasons given for stopping using marihuana and glue by the students who are or have been users. Only one-fifth of the glue sniffers say they have not stopped as compared to 62% of marihuana users. These responses, along with the high percentage of sniffers (50%) who claim to have started prior to 1969, are difficult to reconcile with the fact that 66% of the glue sniffers claim to be in Grade 6 or 7.

Parental Awareness of Drug Use

Three-quarters of students who use marihuana and two-thirds of those who use glue believe that their parents do not know they use these drugs. By contrast, only 28% of the alcohol drinkers said their parents were not aware of their drinking. Almost half of the students who use alcohol claim their parents approve. Only 5% and 7% respectively of marihuana and glue users report parental approval. Parents apparently hold very different attitudes toward the use of alcohol by their children compared to the use of marihuana or glue.

parent
approval

User Typologies

In order to analyze drug usage a series of drug user typologies were developed. Each typology was constructed so that an individual was included in one and only one group. Each of the 3406 possible combinations was considered as a separate typology. The typologies which occurred most frequently were those students who used none of the 12 drugs 38.2%, those who used alcohol only 21.8%, alcohol and tobacco only 10.4%, and alcohol, tobacco and illicit drugs only 5.8%. All of the other groups included less than 4% of the students.

When the use of tobacco and alcohol are excluded from the typological analysis, the percentage of non-users of the other 10 drugs is 74.1%. In other words, one-quarter of the students report using psychoactive drugs (tranquilizers, barbiturates or stimulants and/or illicit drugs, marihuana, LSD, opiates other hallucinogens, speed or glue and solvents). Table 9 shows a typological breakdown of drug usage for 1968 and 1970 for these groups of drug users.

In 1968 there is a fairly even split with slightly less than half of the drug users (46.8%) using one or more of the psychoactive drugs but no illicit drugs and more than half (53.2%) of them using illicit drugs. In 1970 the proportion of psychoactive drug users to illicit drug users was very different. Only 16.9% of the drug users used just one or more psychoactive drug while 83.1% used illicit drugs.

The majority of those students categorized as psychoactive drug users were taking only one psychoactive drug, primarily tranquilizers. However, the majority of illicit drug users were taking a combination of illicit drugs rather than just one.

It is clear that there has been a substantial shift between 1968 and 1970 in the pattern of student drug use. The proportion of illicit drug users has increased dramatically and many people categorized as illicit drug users are using not just one but a combination of marihuana, LSD, other hallucinogens, opiates, speed, glue or solvents.

Relationship Among Use of Drugs

In order to determine the relationship among the use of various drugs, contingency coefficients were calculated. The degree of correlation between each of the 12 drugs is shown in Table 10.

The strongest relationship found was between the use of glue and the use of other solvents. The contingency coefficient is .73. This indicates that students who are heavy users of glue also tend to be heavy users of other solvents. Glue use is relatively closely related to the

Table 9

TYPOLOGY OF DRUG USERS FOR 1968 AND 1970

DRUG USED	1968	1970
	%	%
1. Psychoactive Drugs		
One Psychoactive Drug Only		
(a) Stimulants only	10.5	2.9
(b) Barbiturates only	3.2	1.5
(c) Tranquilizers only	24.8	10.0
Total Users of Only One	38.5	14.4
Two or More Psychoactive Drugs Only	8.3	2.5
Total Psychoactive Drugs Only	46.8	16.9
2. Illicit Drugs		
(a) Marihuana only (no other illicit drugs)	16.8	19.8
(b) Speed only (no other illicit drugs)		.5
(c) LSD only (no other illicit drugs)		1.0
(d) Opiates only (no other illicit drugs)		.2
(e) Other Hallucinogens only (no other illicit drugs)		1.0
(f) Glue and/or solvents only (no other illicit drugs)		13.3
One or More Illicit Drugs With or Without Psychoactives	53.2	83.1
Total Drug Users	1,260	2,291

Table 10

CONTINGENCY COEFFICIENTS OF INTERRELATIONSHIPS AMONG USE OF VARIOUS DRUGS

	Alco.	Tob.	Mar.	Glue	Solv.	Barb.	Op.	Speed	Stim.	Tran.	L.S.D.	Other Hal.
Alcohol		.454	.469	.278	.252	.289	.258	.254	.297	.240	.247	.215
Tobacco			.497	.282	.256	.329	.332	.348	.369	.270	.369	.298
Marihuana				.357	.312	.404	.466	.457	.418	.298	.552	.437
Glue					.732	.482	.468	.501	.502	.361	.359	.313
Other Solvents						.473	.461	.474	.475	.338	.341	.288
Barbiturates							.664	.613	.625	.482	.475	.458
Opiates								.644	.615	.454	.534	.518
Speed									.692	.468	.572	.531
Stimulants										.513	.517	.505
Tranquilizers											.550	.438
L.S.D.												.656

use of speed and stimulants, C = .501 and .502 respectively. The use of other solvents is moderately related to the use of barbiturates, speed, stimulants and opiates.

The use of four drugs, barbiturates, speed, stimulants and opiates is highly interrelated. All of the contingency coefficients are larger than .600. Use of each of these four drugs is more closely related to use of each of the other three in this group than to any other drug studied. The users of these four drugs represent a sub-group or typology. It is noteworthy that a relatively close relationship exists between the use of each of the four above drugs and most other drugs with the exception of alcohol and tobacco. Heavy users of opiates and speed, for example, are also heavy users of LSD, other hallucinogens, tranquilizers and glue.

Marihuana is the most commonly used drug after alcohol and tobacco. It is the one around which most of the present drug controversy centres. Marihuana use is more closely related to the use of LSD than any other drug, C = .552. The two drugs for which strong associations in terms of use were also found are alcohol and tobacco. Both alcohol and tobacco are more closely correlated with marihuana than with any other drug. Tobacco is more closely related to marihuana than is alcohol but the coefficients of concordance are almost the same, .497 and .469 respectively. It is interesting to note that the only drugs besides marihuana to which tobacco and alcohol indicate a strong relationship are tobacco and alcohol as related to each other. The coefficient of concordance is .454.

While the use of each drug is significantly related to the use of every other drug, three sub-groups appear to exist among drug using students. The first sub-group is made up of students who use alcohol, tobacco and marihuana. The second group uses barbiturates, opiates, speed and stimulants. The third group consists of those who use glue and other solvents.

It is possible to estimate the number of students in each sub-group by using the data presented in the typological analysis. There were 888 students who reported using alcohol, tobacco and marihuana. It should be noted that only those students who used all three of the drugs are included. Whether or not they used other drugs was ignored. Similarly, 71 students used all four of barbiturates, opiates, speed and stimulants. The number of students using both glue and other solvents was 251.

Alienation and Drug Use

The concept of Alienation, as used here, is based on the work of Dean (1961). It describes a syndrome composed of three primary components, Powerlessness, Social Isolation and Normlessness. These three components are probably situation-related variables rather than personality traits.

The first element, Powerlessness, implies the individual's separation from effective control over his environment. It is based on a feeling of being unable to understand or influence the events upon which one's life and happiness depend.

The second element, Social Isolation, has its origins in Durkheim's concept of anomie which included feelings of separation from the group and/or isolation from group standards. The individual feels rejected by his peers, and has limited or unsatisfying interactions with others, including limited participation in groups and social activities.

The third element, Normlessness, is also derived from Durkheim's concept of anomie and has two rather distinct dimensions. The first Normlessness dimension involves an absence of values which give purpose and direction to life or an apparent loss of socialized values and the sense of purposelessness. In effect, it is the absence of norms or guidelines on which to base behaviour. The second Normlessness dimension may be considered as a conflict of norms. /An individual, in effect, is normless because he is unable to personally resolve conflicts produced by pressures from different groups and/or different beliefs. Therefore he has no standard upon which he can base his behaviour since the norms which he attempts to respond to are in conflict./

The concept of Alienation was measured by means of an Alienation Scale which provides measures of Powerlessness, Social Isolation, Normlessness and, based on the sum of the three sub-concepts, an overall measure of Alienation. The scale items consist of the final 24 questions in the questionnaire. (See Appendix 3 for the questionnaire).

The Grade 6 and 7 students experienced difficulty in completing the questions. Dean's (1961) Alienation scale was developed for use by college students and many of the terms and concepts proved to be beyond the grasp of the

elementary school students. The data from the Grade 6 and 7 students were not used in the analysis.

The Powerlessness, Social Isolation, Normlessness and total Alienation scores were cross-tabulated with student use of the 12 drugs and students' reports of their mothers' and fathers' use of alcohol, tobacco, stimulants, tranquilizers and barbiturates. For ease of cross-tabulation, the students were divided into quartiles on the basis of their score on each of the four Alienation measures.

Alienation and Student Use of Drugs

Drug usage is significantly related to students' overall levels of Alienation and to their levels of Normlessness. A significant relationship was found between Normlessness scores and use of all 12 drugs and between overall Alienation and all drugs except speed. Powerlessness is related to the use of all drugs except opiates, speed and LSD. Social Isolation is significantly related to only half of the drugs, namely alcohol, tobacco, glue, other solvents, barbiturates and tranquilizers. The X^2 values are shown in Table 37, Appendix 2.

Drug use appears to be more consistently related to Normlessness than to Powerlessness or Social Isolation. Apparently students who experience a lack of norms or who are acutely aware of conflicting norms tend to use drugs. Those students who hold beliefs consistent with the norms of their parents and the so-called "straight world" are less likely to use drugs. The use of drugs probably is part of the search for identity and the establishment of meaningful norms. Students under pressure from conflicting norms may use some of the drugs such as alcohol, marihuana and tranquilizers as an "escape."

Those students who have a high sense of social isolation tend to use alcohol, tobacco, glue, other solvents, barbiturates and tranquilizers. The users of marihuana, opiates, speed, stimulants, LSD and other hallucinogens do not score more highly on the Social Isolation scale than non-users. The users of the latter group of drugs tend to be members of a "drug sub-culture" and are not likely to feel particularly isolated from other people. The Social

Isolation scale measures the degree of personal separation from other people and groups. Persons who are part of a sub-culture probably experience relatively low levels of Social Isolation because of strong feelings of identification with the specific sub-culture.

Powerlessness is associated with the use of drugs other than opiates, speed and LSD. An individual who takes opiates, speed or LSD has little or no control over his drug-induced experience. The user of the other drugs tends to have some measure of control and the drugs may actually produce feelings of power. This is particularly true of the way in which alcohol is used by people to provide them with "strength" and "courage" to face difficult situations.

While drug use tends to be positively related to alienation, that is as the alienation level increases drug use increases, the relationship is not always linear. Five drug use categories were utilized in the analysis, namely, never use, have used one or two times in past six months, have used three or four times, have used five or six times and have used seven or more times in past six months. Generally, alienation increased as the use of drugs increased but then decreased among the heavy drug users. In effect, the heavy drug users tend to be less alienated than the moderate users, as measured by this instrument.

Alienation and Parental Use of Drugs

The students' reports of parental use of alcohol, tobacco, tranquilizers and stimulants were cross-tabulated with their four Alienation scores. A problem arose because parental use of both alcohol and tobacco were measured by one question and the degree of use of these two drugs was not measured. Therefore, the relationships between Alienation and tobacco or alcohol usage were not as precisely measured as those for the three other drugs. Student alienation, as measured by the three sub-scales and the total score of these sub-scales, increases as parental use of psychoactive drugs such as tranquilizers, stimulants and barbiturates increases. (See Table 38, Appendix 2.)
Students who report their fathers use both alcohol and tobacco tend to be more normless than those whose fathers use neither or use either one. Students whose mothers drink alcohol and smoke tobacco are more socially isolated

and more alienated than those whose mothers use neither or just one of these drugs.

Alienation as a Determinant of Drug Use

The analysis of student alienation, student drug use and parental drug use data allows only tentative conclusions regarding their interrelationship. The study was not designed specifically to determine the causality of drug usage but does allow the development of a paradigm which might be further tested in later studies.

Since a previous section presented the results of cross-tabulations between parental and student drug use, there are available measures of the relationships among three sets of variables taken two at a time. The variables are student drug use, parental drug use and student alienation scores.

The problem is one of determining the relationship among the three variables in terms of casuality. There are six possible ways the variables may be related. These are:

1. Parental use → Student alienation → Student use
2. Parental use → Student use → Student alienation
3. Student alienation → Student use → Parental use
4. Student alienation → Parental use → Student use
5. Student use → Student alienation → Parental use
6. Student use → Parental use → Student alienation

The data in their present cross-tabulation form can be used to support any of the six causality sequences. If one makes the logical assumption that parental use began prior to student use and that parental use did not start because of student alienation, then only the first two sequences are possible. The first of these appears more probable than the second but the manner in which the data were analyzed does not allow an accurate test of this hypothesis.

Further analysis of the data, in a modified form, could be undertaken to determine whether student alienation is an intervening variable between parental drug use and student drug use by using Hyman's (1955) Elaboration Analysis. Similarly the adequacy of the first sequence, Parental drug use → Student alienation → Student drug use, as a causal model could be evaluated using Simon-Blalock Causal Model Analysis (McCrone and Cnuddle, 1967).

Discussion

The present study, which is a repetition of the 1968 survey, found substantial changes in drug use rates. Several drugs, glue and tobacco have decreased in popularity. However, the percentage of students using alcohol, marihuana opiates and LSD and other hallucinogens has increased substantially - in the case of marihuana, by 173% and other hallucinogens by 235%. In addition, the number of heavy users of illicit drugs has increased. There is a trend away from use of only psychoactive drugs to multiple use of illicit drugs. Drug use was found to be associated with individual and social characteristics such as religion, living arrangements, grade average, social class, extra-curricular activities etc. For the most part these characteristics are similar to those found in the 1968 study although some differences were also observed.

It is clear that heavy illicit drug use is increasing rapidly. At the present rate of increase it would take only four years until marihuana is used by more students than is alcohol and less than 6 years until everyone is using marihuana. Methods for preventing this development have * not yet been found. Although considerable drug education was undertaken in Toronto schools in the past two years, it has not reduced illicit drug use. Perhaps it has helped to decrease smoking and glue use but the program did not focus on these two drugs. Experimentation in new methods of drug education is certainly needed as are additional studies of the trends in adolescent drug use.

This study demonstrates that drug use varies with age, sex and grade. Males, as found in 1968, are still more likely to use most drugs than females. However, much of the current increase from 1968 to 1970 is attributable to an increasing drug acceptance by females.

The 1970 data indicate that drug use peaks at Grade 11 instead of Grade 9 as was the case in 1968. It should be pointed out that this does not indicate that the crest of a wave is passing into higher and higher grades, later to disappear and hence produce lower drug use rates. The percentages of students using illicit drugs is higher in Grades 9 and 11 in 1970 than they were in 1968 in any grade. The use of all illicit drugs is higher in all grades in 1970 than in 1968 and there is no sign that the movement of the crest will be associated with less drug use.

Alienation was found to be associated with most types of drug use. However, the most important aspect seems to be normlessness and not social isolation or powerlessness for most drugs. Users of illicit drugs who probably have contacts with drug sub-cultures show little feeling of social isolation. Those with an acute sense of social isolation tend to be users of the socially acceptable drugs such as alcohol and tranquilizers. These findings make it obvious that counter cultures associated with drug use are developing. The relationship between parental drug use and alienation is also important. It suggests that the development of drug education programs will have to take into account the interplay between parental drug use, adolescent alienation and adolescent drug use. Just which factors come first in the time sequence will be a matter for further research.

The use of all drugs was closely associated with parental drug use. The association is closer with mothers' than with fathers' drug use. The heavier the parental drug use the more likely the child will be a user of psychoactive and illicit drugs. These basic findings are very similar to those found in a study of high school students in the Niagara Counties (Smart, Fejer and Alexander, 1970). In both studies students were asked to report their parents' drug use so this data was indirectly obtained. However, the frequency of use of psychoactive drugs reported for parents is very close to that found in a national survey in the United States (Parry, 1968). Probably large over or under estimates of parental drug use have not been made by the students.

The findings for parental drug use have a number of implications. They indicate the need for studies of child rearing practices in relation to drug use. They suggest also, that education methods will have to involve parents to a much greater extent than has been done so far. More generally, they show that current adolescent drug use has its roots in the larger society and in aspects of adult behaviour. Efforts to concentrate drug abuse prevention and control on young persons will probably be ineffective.

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Appendix 1

RESPONSE TO EACH QUESTION
ON 1970 QUESTIONNAIRE

Appendix 1

Responses to Each Question

QUESTION NUMBER

RESPONSES

1. Distribution of students by age

	AGE	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A.	10 years or under	7	-	74	1
B	11, 12, or 13 years	1,690	26	3,748	42
C.	14, 15 or 16 years	2,538	39	2,725	31
D.	17, 18 or 19 years	1,965	31	2,138	24
E.	20 years or over	171	3	162	2
F.	No reply	76	1	18	-
Total		6,447	100	8,865	100

2. Distribution of students by sex

	SEX	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A.	Male	3,298	51	4,395	50
B.	Female	3,097	48	4,453	50
C.	No reply	52	1	17	
Total		6,447	100	8,865	100

3. Distribution of students by scholastic program

PROGRAM	NUMBER	%
A. 4 or 5 year Arts and Science	4036	45
B. 4 or 5 year Business and Commerce	556	6
C. 4 or 5 year Science Trades and Technology	429	5
D. Any 2 year program	37	1
E. Other	3,702	42
F. No Reply	105	1
Total	8,865	100

4. Distribution of students by father's place of birth.

PLACE OF BIRTH	1968		1970	
	NUMBER	%	NUMBER	%
A. North America (Canada, United States)	3,983	62	5,387	61
B. British Isles (England, Ireland Scotland)	858	13	1,044	12
C. Europe (France, Germany, Greece Italy, Austria Scandinavia and Others)	897	14	1,370	15
D. Poland, Czechoslovakia, Hungary, Russia	372	6	454	5
E. Elsewhere	272	4	571	6
F. No reply	65	1	39	1
Total	6,447	100	8,865	100

5. Distribution of students by mother's place of birth

PLACE OF BIRTH	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A. North America (Canada, United States)	4,130	65	5,624	63
B. British Isles (England, Ireland, Scotland)	813	12	975	11
C. Europe (France Germany, Greece Italy, Austria Scandinavia and Others)	898	14	1,293	15
D. Poland, Czechoslovakia, Hungary Russia	295	5	368	4
E. Elsewhere	244	3	579	6
F. No reply	67	1	26	1
Total	6,447	100	8,865	100

6.& 7. Distribution of students by language of parents.

LANGUAGE	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A. English	5,187	79	7,061	79
B. Polish, Czechoslovakian, Hungarian, Roumanian, Ukrainian, Russian	521	8	661	7
C. Italian, Portuguese or Spanish	423	6	617	7
D. German, French or Scandinavian	262	4	373	4
E. Chinese or Japanese	115	2	191	2
F. Jewish or Hebrew	29	1	26	1
Total	6,537	100	8,929	100
Less multiple responses	90		64	
	6,447		8,865	

8. Distribution of students by family religion

	1968		1970	
RELIGION	NUMBER	%	NUMBER	%
A. Catholic	2,027	31	2,678	30
B. Protestant (Anglican Presbyterian, United Baptist, etc.)	3,547	55	4,604	52
C. Jewish	158	3	240	3
D. No religion or I don't know	389	6	798	9
E. Other	273	4	525	6
F. No reply	51	1	20	-
Total	6,445	100	8,865	100

9.* Distribution of students by place of residence

	1970	
	NUMBER	%
A. Living with both parents	7,823	88
B. Living with mother only	723	8
C. Living with father only	130	2
D. Living in other arrangements (sister, uncle, alone, etc.)	183	2
E. No reply	6	-
Total	8,865	100

* Data collected in 1968 not comparable

10. Distribution of students by hours worked by father (male guardian)

	1968		1970	
HOURS WORKED	NUMBER	%	NUMBER	%
A. Father works all day (daytime)	4,772	74	6,616	74
B. Father works Shifts or evenings	803	12	1,210	14
C. Father works part-time	81	2	87	1
D. None of these; other	504	8	586	7
E. My father is not working now	228	3	306	3
F. No reply	59	1	60	1
Total	6,447	100	8,865	100

11. Total student popluation by hours worked by mother

HOURS WORKED	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A. Mother works all day (daytime)	1,883	29	2,563	29
B. Mother works shifts or evenings	258	4	425	5
C. Mother works part-time	901	14	1,305	14
D. None of these; other	791	12	828	9
E. My mother is not working now	2,576	40	3,726	42
F. No reply	38	1	18	1
Total	6,447	100	8,865	100

12. Distribution of students by father's employment

TYPE OF WORK	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A. Professional and Managerial (Doctor, Teacher, Manager, Architect, Engineer)	2,161	34	3,096	35
B. Proprietor (Store or Small Business Owner)	407	6	553	6
C. Clerical or Sales (Bookeeper, Secretary, Office Work, Salesman)	1,028	16	1,445	16
D. Skilled or Technical (Mechanic, Electrician Baker, Machine Operator)	1,343	21	1,855	21
E. Semi-skilled (Construction, Driving, Shipping, General Labour)	1,359	21	1,817	21
F. No reply	149	2	99	1
Total	6,447	100	8,865	100

13. Total student population by average mark for all subjects this year.

SUBJECT AVERAGE	1968 NUMBER	%	1970 NUMBER	%
A. Under 40	68	1	110	1
B. 40 - 50	307	5	426	5
C. 50 - 65	2,413	37	2,738	31
D. 65 - 75	2,406	37	3,232	37
E. 75 or over	1,141	18	2,172	24
F. No reply	112	2	187	2
Total	6,447	100	8,865	100

14. Total student population by older siblings.

SIBLINGS	1968 NUMBER	%	1970 NUMBER	%
A. I am only child	482	8	574	6
B. I am the oldest child	2,063	32	2,733	31
C. I have one older brother	1,015	16	1,385	16
D. I have one older sister	929	14	1,275	14
E. Other	1,897	29	2,886	32
F. No reply	61	1	12	1
Total	6,447	100	8,865	100

15. Total student population by weekly spending money.

MONEY (from job allowance etc.)	1968 NUMBER	%	1970 NUMBER	%
A. 50 ¢ or less	879	14	1,613	18
B. 51¢ to $2.00	2,255	35	3,230	36
C. $2.01 to $ 5.00	1,803	28	2,043	23
D. $5.01 to $10.00	838	13	1,041	12
E. $Over $10 a week	589	9	872	10
F. No reply	83	1	66	1
Total	6,447	100	8,865	100

16. Total student population by number of siblings who have taken marihuana or sniffed glue.

DRUG USAGE	1968 NUMBER	%	1970 NUMBER	%
A. They've used marihuana only	181	3	728	8
B. They've used glue only	83	1	89	1
C. They've used both marihuana and glue	78	1	147	2
D. They've never used marihuana or glue	4,409	69	5,461	61
E. I don't know-or-I have no brothers or sisters	1,622	25	2,405	27
F. No reply	74	1	35	1
Total	6,447	100	8,865	100

17. Total student population by tobacco and alcohol use of father (male guardian).

TOBACCO AND ALCOHOL USE	1968 NUMBER	%	1970 NUMBER	%
A. Tobacco only	1,035	16	1,344	15
B. Alcohol only	1,160	18	1,784	20
C. Tobacco and alcohol	2,720	42	3,450	39
D. Neither tobacco nor alcohol	1,062	17	1,637	18
E. I don't know-or I have no father	395	6	614	7
F. No reply	75	1	36	1
Total	6,447	100	8,865	100

18. Total student population by tobacco and alcohol use of mother.

TOBACCO AND ALCOHOL USE	1968 NUMBER	%	1970 NUMBER	%
A. Tobacco only	999	15	1,260	14
B. Alcohol only	1,267	20	1,889	21
C. Tobacco and alcohol	1,588	25	1,932	22
D. Neither tobacco nor alcohol	2,345	36	3,403	38
E. I don't know-or-I have no mother	185	3	349	4
F. No reply	63	1	32	1
Total	6,447	100	8,865	100

19. Total student population by number of known suppliers of marihuana.

NUMBER OF SUPPLIERS	1968		1970	
	NUMBER	%	NUMBER	%
A. No one	3,617	56	4,450	50
B. One person	793	12	686	8
C. Two people	624	10	641	7
D. Three people	349	5	470	5
E. Four people or more	1,002	16	2,588	29
F. No reply	62	1	30	1
Total	6,447	100	8,865	100

20.* Total student population by mother's use of tranquilizers

FREQUENCY OF USE	1970	
	NUMBER	%
A. Never	5,973	50
B. Less than once a month	714	8
C. Every week but not every day	335	7
D. Nearly every day	264	5
E. I don't know or I have no mother	1,515	29
F. No reply	64	1
Total	8,865	100

21* Total student population by father's use of tranquilizers.

FREQUENCY OF USE	1970	
	NUMBER	%
A. Never	6,529	74
B. Less than once a month	408	4
C. Every week but not every day	146	2
D. Nearly every day	124	1
E. I don't know or I have no father	1,625	18
F. No reply	33	1
Total	8,865	100

* Data collected in 1968 not comparable.

22* Total student population by mother's use of stimulants

	1970	
FREQUENCY OF USE	NUMBER	%
A. Never	7,039	79
B. Less than once a month	261	3
C. Every week but not every day	119	1
D. Nearly every day	129	1
E. I don't know or I have no mother	1,286	15
F. No reply	31	1
Total	8,865	100

23* Total student population by father's use of stimulants or pep pills.

	1970	
FREQUENCY OF USE	NUMBER	%
A. Never	7,018	79
B. Less than once a month	170	1
C. Every week but not every day	55	1
D. Nearly every day	50	1
E. I don't know or I have no father	1,535	17
F. No reply	37	1
Total	8,865	100

24.* Total student population by mother's use of barbiturates or sleeping pills.

	1970	
FREQUENCY OF USE	NUMBER	%
A. Never	6,595	74
B. Less than once a month	796	9
C. Every week but not every day	261	3
D. Nearly every day	145	1
E. I don't know or I have no mother	1,042	12
F. No reply	26	1
Total	8,865	100

* Data collected in 1968 not comparable.

25.* Total student population by father's use of barbiturates or sleeping pills.

	1970 NUMBER	1970 %
A. Never	6,892	78
B. Less than once a month	382	4
C. Every week but not every day	130	1
D. Nearly every day	76	1
E. I don't know or I have no father	1,359	15
F. No reply	26	1
Total	8,865	100

* Data collected in 1968 not comparable.

26. Total student population by tobacco use in past six months.

FREQUENCY OF USE	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A. Not at all	4,015	62	6,175	69
B. One to 5 cigarettes per week	938	15	1,051	12
C. Six to 10 cigarettes per week	243	3	259	3
D. 11 to 20 cigarettes per week	268	4	279	3
E. 20 cigarettes or over per week or regular user	948	15	1,082	12
F. No reply	35	1	19	1
Total	6,447	100	8,865	100

27. Total student population by alcohol use in past six months.

FREQUENCY OF USE	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A. Not at all	2,009	31	4,171	47
B. Less than once per month	918	14	2,267	25
C. About twice per month	319	5	906	10
D. About three times per month	186	3	528	6
E. About four or more times per month	255	4	975	11
F. No reply	2,760	43	18	1
Total	6,447	100	8,865	100

28. Total student population by marihuana use in past six months

FREQUENCY OF USE	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A. Not at all	5,996	93	7,582	85
B. One or two times	194	3	440	5
C. Three or four times	64	1	192	2
D. Five or six times	64	1	133	1
E. Seven or more times	129	2	504	6
F. No reply	00	0	14	1
Total	6,447	100	8,865	100

29. Total student population by frequency of sniffing glue in past six months.

FREQUENCY OF SNIFFING GLUE	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A. Not at all	6,092	94	8,499	96
B. One or two times	205	3	224	2
C. Three or four times	32	1	47	1
D. Five or six times	19	*	28	*
E. Seven or more times	60	1	50	1
F. No reply	39	1	17	*
Total	6,447	100	8,865	100

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* Less than .5%

30.* Total student population by frequency of sniffing other solvents in past six months.

FREQUENCY OF SNIFFING SOLVENTS	1970 NUMBER	%
A. Not at all	8,224	93
B. One or two times	432	5
C. Three or four times	81	1
D. Five or six times	26	*
E. Seven or more times	80	1
F. No reply	22	*
Total	8,865	100

*Data collected in 1968 not comparable.

31. Total student population by use of barbiturates in the last six months.

FREQUENCY OF USE	1968 NUMBER	%	1970 NUMBER	%
A. Not at all	6,155	95	8,525	96
B. One or two times	105	1	155	2
C. Three or four times	31	1	64	1
D. Five or six times	17	1	25	*
E. Seven or more times	59	1	58	1
F. No reply	80	1	38	*
Total	6,447	100	8,865	100

32. Total student population by use of opiates in the last six months.

FREQUENCY OF USE	1968 NUMBER	%	1970 NUMBER	%
A. Not at all	6,260	95	8,503	96
B. One or two times	75	1	194	2
C. Three or four times	24	1	47	1
D. Five or six times	4	1	34	*
E. Seven or more times	27	1	57	1
F. No reply	57	1	30	*
Total	6,447	100	8,865	100

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* Less than .5%

33.* Total student population by use of "speed" in past six months.

FREQUENCY OF USE	1970 NUMBER	%
A. Not at all	8,503	96
B. One or two times	194	2
C. Three or four times	47	1
D. Five or six times	34	*
E. Seven or more times	57	1
F. No reply	30	*
Total	8,865	100

* Data collected in 1968 not comparable.

34. Total student population by use of stimulants in past six months.

FREQUENCY OF USE	1968 NUMBER	%	1970 NUMBER	%
A. Not at all	5,967	92	8,349	94
B. One or two times	282	4	294	4
C. Three or four times	70	1	84	1
D. Five or six times	34	1	29	*
E. Seven or more times	73	1	76	1
F. No reply	21	1	33	*
Total	6,447	100	8,865	100

35. Total student population by use of tranquilizers in the past six months.

FREQUENCY OF USE	1968 NUMBER	%	1970 NUMBER	%
A. Not at all	5,787	89	8,192	92
B. One or two times	367	6	346	4
C. Three or four times	89	1	94	1
D. Five or six times	35	1	43	*
E. Seven or more times	106	2	138	2
F. No reply	63	1	52	1
Total	6,447	100	8,865	100

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*Less than .5%

36. Total student population by use of LSD in the past six months.

	1968		1970	
FREQUENCY OF USE	NUMBER	%	NUMBER	%
A. Not at all	6,217	95	8,229	93
B. One or two times	81	1	280	3
C. Three or four times	26	1	116	1
D. Five or six times	18	1	49	1
E. Seven or more times	38	1	133	1
F. No reply	67	1	58	1
Total	6,447	100	8,865	100

37. Total student population by use of other hallucinogens in the past six months.

	1968		1970	
FREQUENCY OF USE	NUMBER	%	NUMBER	%
B. One or two times	6,265	96	8,297	93
C. Three or four times	75	1	240	3
D. Five or six times	22	1	71	1
E. Seven or more times	7	1	26	*
F. No reply	24	1	70	1
	54	1	161	2
Total	6,447	100	8,865	100

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*Less than .5%

38. Total student population by year when alcohol was first consumed.

	1968		1970	
TIME OF FIRST DRINK	NUMBER	%	NUMBER	%
A. This year - 1970	229	4	342	4
B. Last year - 1969	530	8	687	8
C. Two or three years ago-1967-68	858	13	1,377	16
D. Four or five years ago-1965-66	394	6	756	8
E. Over five years ago 1964 or before	976	15	1,357	15
F. No reply	3,460	54	4,346	49
Total	6,447	100	8,865	100

39. Total school population by occasion when drinking most apt to occur.

OCCASION	1968 NUMBER	%	1970 NUMBER	%
A. Usually when I'm alone	171	2	225	2
B. When I'm with my close friends	887	14	1,428	16
C. Before, during or after a party	1,053	16	1,591	18
D. Anywhere away from home	173	3	218	3
E. Any time outside of school-does not matter	488	8	711	8
F. No reply	3,675	57	4,692	53
Total	6,447	100	8,865	100

40. Total student population by reason for ceasing use of alcohol.

REASON FOR CEASING	1968 NUMBER	%	1970 NUMBER	%
A. Thought it might be harmful or addictive	150	2	278	3
B. My parents or others forced me to stop	56	1	79	1
C. My friends wanted me to stop	28	*	47	*
D. I'm no longer interested in drinking	448	7	773	9
E. I have not stopped	2,000	31	2,831	32
F. No reply	3,765	59	4,857	55
Total	6,447	100	8,865	100

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*Less than .5%

41. Total student population by parents' knowledge of student's drinking.

PARENTS' KNOWLEDGE	1968 NUMBER	%	1970 NUMBER	%
A. They don't know I drink	921	14	1,108	13
B. They don't know I drink as much as I do	368	6	630	7
C. They know I drink and want me to stop	228	4	276	3
D. They know I drink and OK it	1,205	19	1,802	20
E. I do not live with my parents	47	1	79	1
F. No reply	3,678	56	4,970	56
Total	6,447	100	8,865	100

42. Total student population by year when marihuana was first used.

TIME OF FIRST USE	1968 NUMBER	%	1970 NUMBER	%
A. This year -1970	228	3	310	3
B. Last year -1969	261	4	615	7
C. Two or three years ago -1967-1968	85	2	371	4
D. Four or five years ago 1965-66	20	*	100	1
E. Over five years ago - 1964 or before	35	1	51	1
F. No reply	5,818	90	7,418	84
Total	6,447	100	8,865	100

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*Less than .5%

43. Total student population by reason for ceasing use of marihuana

REASON FOR CEASING	1968 NUMBER	%	1970 NUMBER	%
A. Thought it might be harmful or addictive	95	2	159	2
B. My parents or others forced me to stop	18	*	36	*
C. My friends wanted me to stop	20	*	40	1
D. I'm not interested in using marihuana anymore	119	2	293	3
E. I have not stopped using marihuana	289	5	868	10
F. No reply	5,906	91	7,469	84
Total	6,447	100	8,865	100

44. Total student population by parent's knowledge of student's use of marihuana.

PARENTS' KNOWLEDGE	1968 NUMBER	%	1970 NUMBER	%
A. They don't know I use marihuana	406	6	1,018	12
B. They don't know I use as much marihuana as I do	39	1	118	1
C. They know I use marihuana and they want me to stop	32	*	130	1
D. They know I use marihuana and they OK it	30	*	74	1
E. I have no parents	13	*	19	*
F. No reply	5,927	93	7,506	85
Total	6,447	100	8,865	100

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*Less than .5%

45. Total student population by year when glue was first sniffed.

TIME OF FIRST USE	1968 NUMBER	%	1970 NUMBER	%
A. This year - 1970	157	3	101	1
B. Last year - 1969	101	2	131	1
C. Two or three years ago-1967-68	61	1	137	1
D. Four or five years ago - 1965-66	23	*	42	1
E. Over five years ago - 1964 or before	36	*	51	1
F. No reply	6,069	94	8,403	95
Total	6,447	100	8,865	100

46. Total student population by reason for ceasing sniffing glue.

REASON FOR CEASING	1968 NUMBER	%	1970 NUMBER	%
A. Though it might be harmful or addictive	136	2	162	2
B. My parents or others forced me to stop	15	*	27	*
C. My friends wanted me to stop	21	*	39	*
D. I'm not interested in using glue any more	102	2	134	2
E. I have not stopped using glue	95	1	87	1
F. No reply	6,078	95	8,416	95
Total	6,447	100	8,865	100

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* Less than .5%

47. Total student population by parents' knowledge of student's use of glue.

	1968		1970	
PARENT'S KNOWLEDGE	NUMBER	%	NUMBER	%
A. They don't know I use glue	271	4	282	3
B. They don't know I use as much glue as I do	28	*	40	1
C. They know I use glue and want me to stop	32	*	57	1
D. They know I use glue and OK it	30	*	31	*
E. I have no parents	10	*	12	*
F. No reply	6,076	96	8,443	95
Total	6,447	100	8,865	100

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*Less than .5%

48. Total student population by reason for not using drugs.

	1968		1970	
REASON FOR NON-USE OF DRUGS	NUMBER	%	NUMBER	%
A. Drugs are dangerous to my health	1,115	17	3,618	41
B. Drugs are illegal	126	2	302	2
C. My parents don't approve of my using drugs	124	2	251	3
D. I have other things I enjoy doing	925	14	2,853	32
E. I use drugs	135	7	749	8
F. No reply	4,022	58	1,192	14
Total	6,447	100	8,865	100

49. Total student population by substance causing greatest harm when used a lot.

SUBSTANCE	1970 NUMBER	%
A. Cigarettes	584	7
B. Marihuana	2,101	24
C. Glue	2,496	28
D. Alcohol	646	7
E. Other or any of these	2,902	33
F. No reply	136	1
Total	8,865	100

50. Total student population by meaning of the term "Grass."

MEANING OF "GRASS"	1968 NUMBER	%	1970 NUMBER	%
A. Money in Yorkville	290	5	160	2
B. Marihuana	4,088	63	6,202	70
C. Indian Tobacco	424	7	624	7
D. L.S.D.	320	5	558	6
E. Other-or-none of these	539	8	1,042	12
F. No reply	786	12	279	3
Total	6,447	100	8,865	100

51. Total student population by meaning of the term "Dime Bag."

COST OF "DIME BAG"	1970 NUMBER	%
A. $ 1.00	553	6
B. $ .10	722	8
C. $100.00	435	5
D. $ 10.00	4,784	54
E. Other or none of these	1,712	19
F. No reply	659	8
Total	8,865	100

52. Total student population by factors influencing decision to take/not take drugs

FACTORS INFLUENCING DECISION	1970 NUMBER	1970 %
A. The information you get at school	1,100	12
B. What your parents tell you about drugs	1,233	14
C. Television, books or newspaper information	3,499	39
D. Your family doctor	965	11
E. What your friends tell you about drugs	1,863	21
F. No reply	255	3
Total	8,865	100

53. Total student population by non-user's membership in a group of drug users.

GROUP MEMBERSHIP	1970 NUMBER	1970 %
A. I have never been at a party where there drugs present	5,681	64
B. I have been at drug parties but I do not use drugs myself	2,030	23
C. At parties with drugs, I use drugs	872	10
D. No reply	382	3
Total	8,865	100

54. Total student population by presence at a drug party.

TIMES PRESENT	1970 NUMBER	1970 %
A. Never	5,778	65
B. One or two times	1,410	16
C. Three to five times	641	7
D. Six to ten times	321	4
E. Over ten times	655	7
F. No reply	60	1
Total	8,865	100

55. Total student population by greatest source of drug information.

SOURCE OF INFORMATION	1968 NUMBER	1968 %	1970 NUMBER	1970 %
A. From my family	472	7	1,103	12
B. From the kids I hang around with	1,263	20	2,176	25
C. From my church or school	637	9	1,200	14
D. From the TV, radio, newspaper	2,867	45	3,716	42
E. From my own experience with drugs	189	3	569	6
F. No reply	1,019	16	101	1
Total	6,447	100	8,865	100

56. Total student population by after school recreation.

RECREATION	1968 NUMBER	%	1970 NUMBER	%
A. Stay at home, read, watch T.V. etc.	2,245	35	3,594	40
B. Go to a friend's house go out with a friend	990	15	1,657	19
C. Activiites (sports, music, clubs)	1,082	17	2,110	24
D. Go out or hang around with a group of kids	616	9	886	10
E. None of these	367	6	538	6
F. No reply	1,147	18	80	1
Total	6,447	100	8,865	100

57. Total student population by weekend evening recreation.

RECREATION	1968 NUMBER	%	1970 NUMBER	%
A. Stay at home, read, watch T.V. etc.	832	13	2,383	27
B. Go to a friend's house, go out with a friend (movies, dance)	2,290	36	3,510	39
C. Activities (sports, Music, Clubs)	651	10	1,675	19
D. Go out and hang around with a group of kids (parties,dances)	1,054	16	45	1
E. None of these	413	6	1,174	13
F. No reply	1,207	19	78	1
Total	6,447	100	8,865	100

58. Total student population by total school activities.

TOTAL ACTIVITIES	1970 NUMBER	%
A. No activity	2,332	26
B. One activity	1,739	20
C. Two activities	1,532	17
D. Three activities	1,122	13
E. Four or more activities	2,045	23
F. No reply	95	1
Total	8,865	100

59.* Distribution of students by grade.

	1968		1970	
	NUMBER	%	NUMBER	%
Grade 6	-	-	1,932	22
Grade 7	1,805	28	1,868	21
Grade 9	1,741	27	1,875	21
Grade 11	1,805	28	1,725	20
Grade 13	1,096	17	1,421	16
Total	6,447	100	8,821	100

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* Question not on questionnaire: coded later

Appendix 2

DRUG USE BY DEMOGRAPHIC AND SOCIAL CHARACTERISTICS AND ALIENATION, ALSO COMPARISONS BETWEEN 1968 AND 1970.

[illegible]

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[illegible]
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TABLE 1

DRUG USE BY DISTRICT FOR 1968 AND 1970

PER CENT OF STUDENTS REPORTING USING DRUGS AT LEAST ONCE IN PAST SIX MONTHS

	ALCOHOL		TOBACCO		MARIHUANA		GLUE		SOL-VENTS	BARBITUR-ATES	
	1968	1970	1968	1970	1968	1970	1968	1970	1970	1968	1970
	%	%	%	%	%	%	%	%	%	%	%
1	60.0	46.7	41.7	31.7	11.8	15.8	1.8	3.5	6.4	4.5	4.1
2	48.3	53.4	38.9	27.8	3.1	13.6	5.2	6.6	10.4	0.9	3.2
3	44.7	57.4	41.0	37.4	7.6	17.8	5.4	7.8	10.6	3.7	8.7
4	56.2	82.8	40.4	48.2	4.7	36.9	1.1	3.2	4.5	1.9	6.8
5	41.6	5 .9	36.3	33.8	6.9	12.0	8.1	5.5	7.7	4.4	3.9
6	45.0	42.3	28.4	22.0	3.8	10.2	2.4	2.4	7.1	3.8	2.9
7	53.9	46.1	40.6	28.1	8.3	10.6	7.2	3.9	6.1	5.3	2.6
8	40.1	47.4	33.0	22.7	7.4	10.0	3.6	2.5	5.6	3.8	1.0
9	42.2	52.3	35.7	28.0	5.7	14.0	5.2	3.0	5.3	4.1	2.8
10-12	44.0	55.1	36.8	25.2	3.4	8.6	4.1	3.7	10.6	1.8	4.3
13	45.1	49.2	37.6	30.7	7.9	13.7	3.7	3.1	6.0	3.0	2.7
14	50.5	64.3	47.2	34.0	11.7	22.3	7.5	2.6	4.9	2.8	5.2
15	53.6	60.2	42.0	37.0	6.5	20.5	14.2	10.6	15.0	2.4	5.5
16	40.4	45.3	38.2	26.8	6.1	10.7	13.3	4.8	6.6	4.1	2.4
17	46.8	58.4	29.7	30.2	6.5	18.5	0.5	2.9	5.5	3.9	5.3
Total Sample	46.3	52.9	37.6	30.3	6.7	14.5	5.7	4.1	7.2	3.3	3.8

TABLE 1 (continued)

DRUG USE BY DISTRICT FOR 1968 AND 1970

PERCENT OF STUDENTS REPORTING USING DRUGS AT LEAST ONCE IN PAST 6 MONTHS

DISTRICT	Opiates		Speed*	Stimulants		Tranquilizers		L.S.D.		Other Hallucinogens	
	1968	1970	1968	1968	1970	1968	1970	1968	1970	1968	1970
	%	%	%	%	%	%	%	%	%	%	%
1	1.4	3.1	6.2	5.9	4.6	9.6	5.2	4.1	9.1	2.5	6.6
2	0.7	3.8	3.2	4.9	6.1	8.0	7.2	0.9	6.8	1.4	6.3
3	2.3	5.6	7.0	8.5	10.4	9.9	11.7	3.9	10.7	2.9	8.0
4	1.0	10.7	7.4	7.8	9.7	12.2	11.3	1.9	11.7	1.1	11.0
5	4.2	4.5	4.3	7.3	6.6	7.5	6.8	3.9	5.5	3.1	5.2
6	1.0	2.4	3.6	5.5	4.0	6.3	6.7	1.5	6.2	0.2	8.2
7	3.7	2.4	4.1	10.9	3.5	9.8	6.1	5.3	5.9	4.2	5.6
8	1.1	2.1	3.3	7.6	4.6	9.7	7.7	1.7	6.0	1.0	5.0
9	1.7	1.7	2.1	7.6	2.8	10.7	7.0	2.4	7.6	1.3	5.9
10-12	1.4	3.4	4.2	6.0	7.0	7.8	7.3	0.4	5.4	1.1	6.0
13	2.6	2.2	3.0	5.4	4.7	9.5	6.9	2.2	6.0	1.7	5.6
14	1.9	5.6	5.4	8.4	7.7	11.3	9.4	2.8	12.0	1.5	9.4
15	2.4	5.5	5.9	6.6	7.5	8.9	10.2	3.0	10.7	3.0	8.7
16	1.8	1.3	1.7	9.7	4.1	12.7	5.2	3.6	4.6	2.4	6.1
17	1.1	4.5	4.2	6.6	7.5	9.3	9.5	0.5	8.0	1.6	4.9
Total	1.9	3.5	4.1	7.3	5.8	9.5	7.6	2.6	7.2	2.0	6.4

* Data not collected in 1968
Total students 1968 - 6,447; 1970 - 8,865

TABLE 2

FREQUENCY OF USE OF ALCOHOL BY SEX AND BY GRADE

FREQUENCY OF USE (TIMES PER MONTH)

	0		1		2		3		4+		NO REPLY		1968	TOTAL	1970	
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	NUMBER	%	NUMBER	%
SEX																
Male	48.3	43.6	24.4	24.0	10.7	10.8	6.4	6.8	10.2	14.6	0.0	0.2	3298	100.0	4394	100.0
Female	59.6	50.4	24.5	27.1	7.8	9.6	3.4	5.2	4.6	7.5	0.0	0.2	3097	99.9	4451	100.0
$X^{2**} = 145.9$ with 5 d.f. Sign $< .01$																
GRADE																
6*	-	72.3	-	14.8	-	4.6	-	2.9	-	5.0	-	0.5	-	-	1932	100.1
7	77.1	60.5	12.7	21.8	4.6	6.4	2.5	3.5	3.1	7.6	0.0	0.2	1816	100.0	1868	100.0
9	58.4	46.1	21.8	27.5	7.8	10.2	4.4	5.5	7.6	10.5	0.0	0.2	1752	100.0	1875	100.0
11	40.3	28.5	32.5	34.1	11.5	14.7	6.6	8.7	9.0	13.9	0.1	0.1	1733	100.0	1725	100.0
13	29.1	17.7	35.2	33.0	16.0	17.4	7.4	10.8	12.3	21.0	0.0	0.0	1146	100.0	1422	99.9
Sub Total 1970 Grades 7 - 13	53.7	39.8	24.5	28.7	9.3	11.8	5.0	6.9	7.5	12.7	0.0	0.1	6447	100.0	6890	100.0
Total Sample	53.7	46.9	24.5	25.7	9.3	10.2	5.0	6.0	7.5	11.0	0.0	0.2	6447	100.0	8822***	100.0
$X^{2**} = 1462.2$ with 20 d.f. Sign .01																

* The 1968 sample did not include Grade 6 students.
** All tests of significance based on 1970 data.
*** This total not equal to 8,865 because 43 students did not indicate their grade.

TABLE 3

FREQUENCY OF USE OF TOBACCO BY SEX AND BY GRADE

	FREQUENCY OF USE (TIMES PER MONTH)										NO REPLY		TOTAL			
	0		1		2		3		4+				1968		1970	
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	NUMBER	%	NUMBER	%
SEX																
Male	56.9	67.6	15.1	11.1	4.3	2.8	4.7	3.2	18.8	15.1	0.2	0.2	3298	100.0	4394	100.
Female	67.3	71.6	15.3	12.6	3.9	3.0	3.5	3.1	8.4	9.4	1.6	0.2	3097	100.0	4451	99.
X^2 = 751.3 with 16 d.f. Sign $<$.01																
GRADE																
6 *	-	87.7	-	7.2	-	1.4	-	0.9	-	2.1	-	0.6	-	-	1932	99.
7	75.3	74.0	14.5	14.7	3.1	2.8	2.9	2.6	4.1	5.9	0.1	0.1	1816	100.1	1868	100.
9	55.6	64.9	18.0	12.9	6.0	3.7	4.4	4.4	15.9	14.1	-	-	1752	99.9	1875	100.
11	53.1	56.0	14.0	13.3	3.6	3.5	6.0	4.0	23.0	23.0	0.2	0.2	1733	99.9	1725	100.
13	60.2	62.0	13.4	11.4	2.6	3.4	5.8	4.1	17.9	18.9	0.1	0.1	1146	100.0	1422	99.
Sub Total 1970 Grades 7-13		69.6		11.9	-	2.9		3.2	-	12.3	-	0.1	-	-	6890	100.
Total Sample	62.2		14.9	13.2	4.1	3.4	4.1	3.7	14.5	15.1	0.2	15.1	6447	-	8822	100.

X^2 = 67.9 with 5 d.f. Sign $<$.01

* The 1968 sample did not include Grade 6 students.

TABLE 4

FREQUENCY OF USE OF MARIHUANA BY SEX AND BY GRADE

	FREQUENCY OF USE (TIMES PER MONTH)												TOTAL			
	0		1		2		3		4+							
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	NUMBER 1968	%	NUMBER 1970	%
SEX																
Male	91.4	83.1	3.7	5.5	1.3	2.6	1.1	1.6	2.5	7.1	0.1	0.1	3298	100.1	4394	100.
Female	95.9	88.0	1.9	4.5	0.9	1.7	0.3	1.4	0.9	4.3	0.2	0.2	3097	100.1	4451	100.
	X^2 = 49.3 with 5 d.f. Sign < .01															
GRADE																
6 *	-	98.9	-	0.6	-	0.1	-	-	-	0.2	0.3	0.3	-	-	1932	100.
7	97.3	94.4	1.3	3.3	0.2	0.6	0.1	0.7	1.0	0.8	0.2	0.2	1816	100.1	1868	100.
9	88.8	84.1	3.0	6.1	1.8	3.0	4.1	2.2	1.9	4.5	0.2	0.2	1752	99.8	1875	100.
11	90.8	71.9	4.2	8.2	1.7	4.1	0.7	2.3	2.3	13.4	0.1	0.1	1733	99.8	1725	100.
13	92.4	73.8	2.1	7.8	0.8	3.7	0.6	2.7	2.7	12.0	-	-	1146	98.6	1422	100.
Sub Total 1970 Grades 7 - 13	-	81.7	-	6.2	-	2.8	-	1.9	1.9	7.3	-	0.1	6447	-	6890	100.
Total Sample	93.1	85.5	2.8	5.0	1.3	2.2	0.7	1.5	1.9	5.7	0.2	0.1	6447	100.0	8822	100.
	X^2 = 912.9 with 20 d.f. Sign < .01															

* The 1968 sample did not include Grade 6 students.

TABLE 5

FREQUENCY OF USE OF GLUE BY SEX AND BY GRADE

FREQUENCY OF USE (TIMES PER MONTH)

	0		1		2		3		4+		NO REPLY		1968	TOTAL	1970	
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	NUMBER	%	NUMBER	%
SEX																
Male	92.6	95.3	4.6	2.9	1.0	0.5	0.3	0.5	1.5	0.6	0.0	-	3298	100.0	4394	99.8
Female	95.4	96.5	2.9	2.2	0.5	0.5	0.4	0.2	0.4	0.5	0.4	-	3097	100.0	4451	99.9
	X^2 = 11.4 with 5. d.f. Sign <.01															
GRADE																
6*	-	94.6	-	3.6	-	0.5	-	0.5	-	0.4	-	0.5	-	-	1932	100.1
7	92.4	93.2	5.5	4.3	0.7	1.0	0.2	0.5	0.8	0.7	0.4	0.3	1816	100.0	1868	100.0
9	90.3	95.1	5.8	2.8	1.0	0.9	0.6	0.4	2.0	0.8	0.3	0.1	1752	100.0	1875	100.1
11	97.0	98.3	1.6	1.0	0.2	0.1	0.0	0.1	0.8	0.5	0.4	0.1	1733	100.0	1725	100.1
13	99.2	99.2	0.3	0.4	0.1	0.1	0.1	-	0.2	0.4	0.1	-	1146	100.0	1422	100.1
Sub Total 1970 Grades 7-13	-	96.2	-	2.3	-	0.6	-	0.3	-	0.6	-	-	6447	-	6890	100.0
Total Sample	94.0	95.9	3.7	2.5	0.6	0.5	0.3	0.3	1.1	0.6	0.3	-	6447	100.0	8822	99.8
	X^2 = 130.8 with 20 d.f. Sign <.01															

* The 1968 sample did not include Grade 6 students.

TABLE 6

FREQUENCY OF USE OF OTHER SOLVENTS BY SEX AND BY AGE

	FREQUENCY OF USE (TIMES PER MONTH)															
	0		1		2		3		4+		NO REPLY		TOTAL			
	1968**	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968 No.	1968 %	1970 NUMBER	1970 %
SEX																
Male	-	93.2	-	4.3	-	0.9	-	0.4	-	1.0	-	0.2	-	-	4395	100.0
Female	-	92.3	-	5.5	-	1.0	-	0.2	-	0.8	-	0.2	-	-	4453	100.0
X^2 = 10.4 with 5 d.f.																
GRADE																
6*	-	89.3	-	7.4	-	0.8	-	0.4	-	1.5	-	0.5	-	-	1932	99.9
7	-	90.0	-	6.7	-	1.6	-	0.4	-	0.9	-	0.4	-	-	1868	100.0
9	-	91.3	-	5.7	-	1.4	-	0.5	-	1.1	-	0.1	-	-	1875	100.1
11	-	96.5	-	2.3	-	0.3	-	0.1	-	0.6	-	0.1	-	-	1725	99.9
13	-	98.5	-	1.1	-	0.1	-	0.1	-	0.2	-	0.0	-	-	1422	100.0
Sub Total 1970 Grades 7-13	-	93.7	-	4.2	-	0.9	-	0.3	-	0.8	-	0.2	-	-	6890	100.1
Total Sample		92.8	-	4.9	-	0.9	-	0.3	-	0.9	-	0.2	-	-	8822	100.0
X^2 = 191.8 with 25 d.f. Sign .01																

* The 1968 sample did not include Grade 6 students.

** The incidence of use of other solvents was not surveyed in 1968.

TABLE 7

FREQUENCY OF USE OF BARBITURATES BY SEX AND BY GRADE

	FREQUENCY OF USE (TIMES PER MONTH)												TOTAL			
	0		1		2		3		4+		NO REPLY					
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968 NUMBER	%	1970 NUMBER	%
SEX																
Male	96.3	96.2	1.7	1.8	0.5	0.5	0.3	0.3	0.8	0.7	0.4	0.4	3298	100.0	4394	99.9
Female	96.4	96.2	1.7	1.7	0.2	0.9	0.2	0.2	0.7	0.6	0.8	0.4	3097	100.0	4451	100.0

X^2 = 6.5 with 5 d.f. Sign $<$.01

	0		1		2		3		4+		NO REPLY		TOTAL			
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968 NUMBER	%	1970 NUMBER	%
GRADE																
6*	-	97.9	-	0.4	-	0.2	-	0.1	-	0.1	-	1.3	-	-	1932	100.0
7	98.4	97.7	0.6	1.1	0.2	0.4	0.1	0.1	0.4	0.4	-	0.4	1816	99.7	1868	100.1
9	95.1	94.9	2.1	2.5	0.3	1.2	0.2	0.7	1.3	0.6	-	0.1	1752	99.0		100.0
11	95.3	93.0	3.0	3.6	0.3	1.5	0.4	0.4	0.7	1.4	-	0.1	1733	99.7	1725	100.0
13	95.9	97.3	1.9	1.3	0.5	0.4	0.4	0.1	1.0	0.9	-	-	1146	99.7	1422	100.0
Sub Total 1970 Grades 7-13		95.7		2.1		0.9		0.3		0.8		0.2	6447	-	6890	100.0
Total Sample	96.1	96.2	1.9	1.8	0.4	0.7	0.2	0.3	0.8	0.6	0.6	0.4	6447	100.0	8822	100.0

X^2 = 211.8 with 20 d.f. Sign $<$.01

* The 1968 sample did not include Grade 6 students.

[illegible]

[illegible]

[illegible]

[illegible]

[illegible]

[illegible]

[illegible]

[illegible]

FREQUENCY OF USE OF OPIATES BY SEX AND BY GRADE

	FREQUENCY OF USE (TIMES PER MONTH) 0		1		2		3		4+		NO REPLY		TOTAL 1968		TOTAL 1970	
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	NUMBER	%	NUMBER	%
SEX																
Male	97.7	95.9	1.2	2.2	0.4	0.5	0.1	0.3	0.5	0.7	0.1	0.4	3298	100.0	4394	100.0
Female	98.4	97.1	0.9	1.5	0.0	0.5	0.0	0.1	0.0	0.5	0.7	0.4	3097	100.0	4451	100.1
$X^2 = 11.8$ with 5 d.f. Sign $<$ .05																
GRADE																
6 *	-	98.2	-	0.3	-	0.1	-	0.1	-	0.2	-	1.2	-		1932	100.1
7	98.7	97.5	0.9	1.2	0.2	0.4	0.0	0.1	0.0	0.2	0.2	0.6	1816	100.0	1868	100.0
9	96.7	95.3	1.8	3.0	0.4	0.4	0.1	0.4	0.7	0.7	0.3	0.2	1752	100.0	1875	100.0
11	98.0	94.2	1.2	3.2	0.2	1.0	0.1	0.2	0.3	1.4	0.2	-	1733	100.0	1725	100.0
13	99.0	97.2	0.5	1.6	0.2	0.6	0.1	0.1	0.2	0.4	0.0	0.1	1146	100.0	1422	100.0
Sub Total 1970 Grades 7-13	-	96.0	-	2.3	-	0.6	-	0.2	-	0.7	-	0.2	6447	-	6890	100.0
Total Sample	97.9	96.5	1.2	1.8	0.3	0.5	0.1	0.2	0.3	0.6	0.2	0.4	6447	100.0	8822	100.0
$X^2 = 11.8$ with 5 d.f. Sign $<$ .05																

* The 1968 sample did not include Grade 6 students.

FREQUENCY OF USE OF SPEED BY SEX AND BY GRADE**

	FREQUENCY OF USE (TIMES PER MONTH) 0 1968**	0 1970	1 1968	1 1970	2 1968	2 1970	3 1968	3 1970	4+ 1968	4+ 1970	NO REPLY 1968	NO REPLY 1970	TOTAL 1968 NUMBER	TOTAL 1968 %	TOTAL 1970 NUMBER	TOTAL 1970 %
EX																
Male		95.3		2.7		0.5		0.4		0.8		0.3	3298	100.0	4394	100.
Female		96.6		1.7		0.6		0.4		0.5		0.3	3097	100.0	4451	100.
RADE																
6 *		97.5		0.9		0.1		0.2		0.3		1.0	-	-	1932	100.
7		97.5		1.1		0.3		0.3		0.5		0.4	1816	100.0	1868	100.
9		94.8		2.9		1.1		0.5		0.7		0.1	1752	100.0	1875	100.
11		93.3		3.9		0.8		0.6		1.4		0.1	1733	100.0	1725	100.
13		96.3		2.5		0.5		0.4		0.4		-	1146	100.0	1422	100.
ub Total rades 7-13		95.9		2.6		0.7		0.4		0.7		0.1	6447	-	6890	100.
otal ample		95.9		2.2		0.5		0.4		0.6		0.3	6447	100.0	8822	99.

$X^2 = 146.4$ with 20 d.f. Sign $< .01$ (Sex)

$X^2 = 161.4$ with 25 d.f. Sign $< .01$

* The 1968 sample did not include Grade 6 students.

** The incidence of use of Speed was not surveyed in 1968.

TABLE 10

FREQUENCY OF USE OF STIMULANTS BY SEX AND BY GRADE

	FREQUENCY OF USE (TIMES PER MONTH)										NO REPLY		TOTAL			
	0		1		2		3		4+				1968		1970	
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	NUMBER	%	NUMBER	%
SEX																
Male	91.3	94.3	5.2	3.0	1.4	1.0	0.6	0.5	1.2	0.9	0.3	0.3	3298	100.0	4394	100.0
Female	94.4	94.1	3.2	3.7	0.8	0.9	0.4	0.2	0.9	0.8	0.3	0.3	3097	100.0	4451	100.0

X^2 = 9.9 with 5 d.f. Sign $<$ .01

	0		1		2		3		4+		NO REPLY		1968 NUMBER	%	1970 NUMBER	%
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970				
GRADE																
6 *	-	97.2	-	1.0	-	0.2	-	0.1	-	0.4	-	1.1	-	100.0	1932	100.0
7	95.7	95.4	2.7	2.4	0.5	0.9	0.1	0.3	1.0	0.6	0.0	0.5	1816	100.0	1868	100.1
9	90.2	90.7	5.3	5.7	2.0	1.9	0.6	0.6	1.5	1.6	0.4	0.1	1752	100.0	1875	100.6
11	92.0	92.1	4.9	4.9	0.9	1.1	0.8	0.5	1.2	1.0	0.2	-	1733	100.0	1725	99.6
13	94.3	95.4	3.3	2.7	1.0	0.6	0.5	0.2	0.8	1.0	0.1	-	1146	100.0	1422	99.9
Sub Total 1970 Grades 7-13	-	93.3	-	4.0	-	1.2	-	0.4	-	1.0	-	0.1	6447	-	6890	100.0
Total Sample	92.6	94.2	4.4	3.3	1.1	1.0	0.5	0.3	1.3	0.9	0.1	0.4	6447	100.0	8822	100.1

X^2 = 191.3 with 20 d.f. Sign $<$ .01

* The 1968 sample did not include Grade 6 students.

TABLE 11

FREQUENCY OF USE OF TRANQUILIZERS BY SEX AND BY GRADE

FREQUENCY OF USE (TIMES PER MONTH)

	0		1		2		3		4+		NO REPLY		TOTAL			
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968 NUMBER	%	1970 NUMBER	%
SEX																
Male	91.7	93.8	5.0	3.1	1.4	0.9	0.3	0.4	1.4	1.3	0.2	0.5	3298	100.0	4394	100.0
Female	89.6	91.1	6.5	4.7	1.7	1.2	0.7	0.6	1.5	1.8	0.0	0.6	3097	100.0	4451	100.0
X^2 = 24.3 with 5 d.f. Sign $<$ .01																
GRADE																
6 *	-	96.5	-	1.4	-	0.1	-	0.2	-	0.5	-	1.3	-	-	1932	100.0
7	95.0	94.6	3.5	2.9	0.7	0.8	0.1	0.2	0.5	0.7	0.2	0.8	1816	100.0	1868	100.0
9	88.2	91.0	8.2	5.4	1.1	1.6	0.5	0.5	1.6	1.3	0.4	0.2	1752	100.0	1875	100.0
11	88.2	89.2	8.0	4.9	1.3	1.7	0.8	0.9	1.5	3.1	0.2	0.2	1733	100.0	1725	100.0
13	85.3	89.6	5.8	5.6	5.0	1.3	0.7	0.6	3.1	2.7	0.3	0.3	1146	100.2	1422	100.1
Sub Total 1970 Grades 7-13	-	91.2	-	4.6	-	1.3	-	0.6	-	1.9	-	0.4	6447	-	6890	100.0
Total Sample	90.3	92.4	6.1	3.9	1.4	1.1	0.5	0.5	1.5	1.6	0.2	0.6	6447	100.0	8822	100.1
X^2 = 203.6 with 20 d.f. Sign $<$ .01																

* The 1968 sample did not include Grade 6 students.

TABLE 12

FREQUENCY OF USE OF L.S.D. BY SEX AND BY GRADE

	FREQUENCY OF USE (TIMES PER MONTH)												TOTAL			
	0		1		2		3		4+		NO REPLY		1968		1970	
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	NUMBER	%	NUMBER	%
SEX																
Male	96.4	91.6	1.4	3.3	0.4	1.7	0.5	0.8	2.0	2.0	0.2	0.6	3298	100.9	4394	100.0
Female	98.7	94.1	0.6	3.0	0.2	1.0	0.1	0.3	1.1	1.1	0.2	0.7	3097	100.9	4451	100.2
X^2 = 374.4 with 20 d.f. Sign < .01																
GRADE																
6 *	-	97.4	-	0.7	-	-	-	0.2	0.2	0.2	-	1.6	-	-	1932	100.1
7	98.4	96.6	0.6	1.5	0.3	0.5	0.4	0.1	0.4	0.4	0.2	1.0	1816	100.3	1868	100.1
9	96.3	90.5	1.0	3.9	1.0	2.2	0.6	0.5	2.6	2.6	0.3	0.3	1752	101.8	1875	100.0
11	96.9	86.6	1.2	6.7	0.1	2.1	0.4	1.6	3.0	3.0	0.3	0.1	1733	101.9	1725	100.1
13	97.7	92.4	1.6	3.4	0.1	2.0	0.0	0.5	1.6	1.6	0.2	0.1	1146	101.2	1422	100.0
Sub Total 1970 Grades 7-13	-	91.5	-	3.8	-	1.7	-	0.7	-	1.9	-	0.4	6447	-	6890	100.0
Total Sample	97.4	92.8	1.2	3.2	0.4	1.3	0.3	0.6	0.6	1.5	0.3	0.6	6447	100.2	8822	100.0

X^2 = 346.4 with 25 d.f. Sign < .01

* The 1968 sample did not include Grade 6 students.

TABLE 13

FREQUENCY OF USE OF OTHER HALLUCINIGENS BY SEX AND BY GRADE

	FREQUENCY OF USE (TIMES PER MONTH) 0		1		2		3		4+		NO REPLY		TOTAL 1968		1970	
	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	1968	1970	NUMBER	%	NUMBER	%
SEX																
Male	96.8	93.0	1.3	2.9	1.0	1.0	0.1	0.5	0.7	1.0	0.6	1.8	3298	100.5	4394	100.2
Female	98.4	94.2	0.6	2.6	4.6	4.6	0.0	0.1	0.0	0.6	0.9	1.8	3097	104.5	4451	103.9
X^2 = 209.5 with 20 d.f. Sign $<$ .01																
GRADE																
6 *	-	94.7	-	1.1	-	0.2	-	-	-	0.3	-	3.7	-	-	1932	100.0
7	98.3	94.9	0.8	1.2	0.2	0.5	0.0	0.3	0.0	0.4	0.7	2.7	1816	100.0	1868	100.0
9	96.2	92.5	1.7	3.6	0.6	1.0	0.1	0.4	0.7	1.1	0.7	1.4	1752	100.0	1875	100.0
11	97.4	91.3	0.9	4.8	0.4	1.4	0.1	0.4	0.5	1.6	0.7	0.5	1733	100.0	1725	100.0
13	99.0	94.5	0.7	3.1	0.2	1.1	0.0	0.4	0.0	0.7	0.1	0.3	1146	100.0	1422	100.1
Sub Total 1970 Grades 7-13	-	93.3	-	3.2	-	1.0	-	0.4	-	0.9	-	1.2	6447	-	6890	100.0
Total Sample	97.4	93.6	1.1	2.7	0.4	0.8	0.1	0.3	0.4	0.8	0.6	1.8	-	100.0	8822	100.0
X^2 = 16.5 with 25 d.f. Sign .01																

* The 1968 sample did not include Grade 6 students.

TABLE 14

DRUG USE AND AGE

	PER CENT OF STUDENTS REPORTING USING DRUGS AT LEAST ONCE IN PAST 6 MONTHS					
DRUG	10 or less	11 - 13	14 - 16	17 - 19	20 or more	Total Sample
Alcohol	21.6	33.3	58.5	78.9	86.4	53.0
Tobacco	8.1	18.5	35.9	42.8	55.6	30.3
Marihuana	4.1	3.2	17.9	29.1	29.0	14.5
Glue	5.4	5.6	4.4	1.3	0.6	4.1
Other Solvents	9.5	10.1	7.3	2.4	1.9	7.2
Barbiturates	1.4	2.2	5.4	4.9	3.1	3.8
Opiates	1.4	2.2	4.4	4.6	3.7	3.5
Speed	1.4	2.2	5.7	5.2	5.6	4.1
Stimulants	1.4	3.5	8.6	6.4	7.4	5.8
Tranquilizers	2.7	4.2	9.1	11.0	14.8	7.6
L.S.D.	5.4	2.9	10.2	10.8	7.4	7.2
Other Halluncinogens	4.1	4.9	7.7	7.3	7.4	6.4
Total Students	74	3,748	2,725	2,138	162	8,847

TABLE 15

DRUG USAGE BY FATHER'S BIRTHPLACE

Drugs	North America		United Kingdom		Western Europe		Eastern Europe		Other			Total Sample	
	Number and Percent of Students Using Once in Last Six Months												
	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	2835	52.6	562	53.8	760	55.5	286	63.0	237	41.5	14	4694	52.9
Tobacco	1751	32.5	316	30.3	337	24.6	134	29.5	137	24.0	14	2689	30.3
Marihuana	834	15.5	179	17.1	128	9.4	80	17.6	58	10.2	3	1282	14.5
Glue	196	3.6	52	5.0	60	4.4	19	4.2	36	6.3	2	365	4.1
Other Solvents	336	6.2	92	8.8	122	8.9	34	7.5	55	9.6	1	640	7.2
Barbiturates	214	4.0	47	4.5	34	2.5	19	4.2	23	4.0	2	339	3.8
Opiates	194	3.6	40	3.8	31	2.3	16	3.5	29	5.1	1	311	3.5
Speed	214	4.0	56	5.4	41	3.0	19	4.2	31	5.4	0	361	4.1
Stimulants	312	5.8	77	7.4	66	4.8	22	4.8	34	6.0	4	515	6.8
Tranquilizers	420	7.8	83	8.0	90	6.6	44	9.7	31	5.4	4	672	7.6
L.S.D.	399	7.4	97	9.3	65	4.7	35	7.7	37	6.5	2	635	7.2
Other Hallucinogens	344	6.4	87	8.3	69	5.0	23	5.1	44	7.7	0	567	6.4

TABLE 16

DRUG USAGE BY MOTHER'S BIRTHPLACE

	North America		United Kingdom		Western Europe		Eastern Europe		Other			Total Sample	
	Number and Percent of Students Using in Last Six Months												
Drugs	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	2936	52.2	528	54.2	721	55.8	242	65.8	257	44.4	10	4694	52.9
Tobacco	1806	32.1	303	31.1	313	24.2	92	25.0	143	24.7	12	2689	30.3
Marihuana	872	15.5	163	16.7	126	9.8	60	16.3	60	10.4	1	1282	14.5
Glue	211	3.8	52	5.3	56	4.3	13	3.5	33	5.7	0	365	4.1
Other Solvents	358	6.4	87	8.9	113	8.8	29	7.9	51	8.8	2	640	7.2
Barbiturates	235	4.2	34	3.5	33	2.6	14	3.8	23	4.0	0	339	3.8
Opiates	206	3.7	37	3.8	28	2.2	10	2.7	28	4.8	2	311	3.5
Speed	232	4.1	46	4.7	38	2.9	12	3.3	31	5.4	2	361	4.1
Stimulants	337	6.0	63	6.5	57	4.4	19	5.2	38	6.6	1	515	5.8
Tranquilizers	448	8.0	78	8.0	80	6.2	31	8.4	33	5.7	2	672	7.6
L.S.D.	422	7.5	86	8.8	61	4.7	28	7.6	37	6.4	1	635	7.2
Other Hallucinogens	364	6.5	78	8.0	64	5.0	22	6.0	39	6.7	0	567	6.4

TABLE 17

DRUG USAGE BY RELIGION OF FAMILY

	Catholic		Protestant		Jewish		No Religion		Other		Total		
	Number and Percent of Students Using Once in Last Six Months												
	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	1534	57.3	2344	50.9	151	62.9	419	52.5	238	45.4	8	4694	52.9
Tobacco	830	31.0	1422	30.9	90	37.5	231	28.9	108	20.6	8	2689	30.3
Marihuana	361	13.5	640	13.9	66	27.5	151	18.9	61	11.6	3	1282	14.5
Glue	114	4.3	183	4.0	12	5.0	35	4.4	19	3.6	2	365	4.1
Other Solvents	237	8.8	283	6.1	18	7.5	59	7.4	41	7.8	2	640	7.2
Barbiturates	119	4.4	147	3.2	16	6.7	41	5.1	15	2.9	1	339	3.8
Opiates	90	3.4	150	3.3	14	5.8	40	5.0	17	3.2	0	311	3.5
Speed	119	4.4	162	3.5	17	7.1	46	5.8	16	3.1	1	361	4.1
Stimulants	157	5.9	262	5.7	17	7.1	47	5.9	32	6.1	0	515	5.8
Tranquilizers	199	7.4	348	7.6	27	11.3	73	9.1	24	4.6	1	672	7.6
L.S.D.	181	6.8	320	7.0	20	8.3	85	10.7	28	5.3	1	635	7.2
Other Hallucinogens	166	6.2	272	5.9	23	9.6	81	10.2	24	4.6	1	567	6.4

TABLE 18

STUDENT DRUG USAGE BY LIVING ARRANGEMENTS

	Lives With Both Parents		Lives With Mother		Lives With Father		Other Arrangements			Total Sample	
	Students Reporting Using Each Drug At Least Once During Last 6 Months										
DRUG	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	4110	52.5	387	53.6	76	58.5	118	64.5	3	4694	52.9
Tobacco	2295	29.3	256	35.5	51	39.2	85	46.4	2	2689	30.3
Marihuana	1102	14.1	108	15.0	29	22.3	42	23.0	1	1282	14.5
Glue	295	3.8	45	6.2	12	9.2	12	6.6	1	365	4.1
Other Solvents	548	7.0	62	8.6	13	10.0	15	8.2	2	640	7.2
Barbiturates	272	3.5	44	6.1	6	4.6	15	8.2	2	339	3.8
Opiates	250	3.2	37	5.1	3	2.3	20	10.9	1	311	3.5
Speed	289	3.7	39	5.4	11	8.5	21	11.5	1	361	4.1
Stimulants	421	5.4	51	7.1	14	10.8	27	14.8	2	515	5.8
Tranquilizers	547	7.0	84	11.6	13	10.0	26	14.2	2	672	7.6
L.S.D.	516	6.6	70	9.7	21	16.2	27	14.8	1	635	7.2
Other Hallucinogens	469	6.0	64	8.9	12	9.2	20	10.9	2	567	6.4

TABLE 19

STUDENT DRUG USAGE BY FATHER'S WORKING HOURS

	Day		Shift		Part Time		Other		No Work		Total		
	Students Reporting Using Each Drug At Least Once During Last Six Months												
	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	3514	53.1	622	51.4	38	43.7	339	57.9	162	52.9	19	4691	52.9
Tobacco	1991	30.1	361	29.8	21	24.1	207	35.4	93	30.4	16	2689	30.3
Marihuana	986	14.9	156	12.9	11	12.6	83	14.2	42	13.7	4	1282	14.5
Glue	235	3.6	70	5.8	6	6.9	36	6.2	16	5.2	2	365	4.1
Other Solvents	435	6.6	113	9.3	11	12.6	51	8.7	28	9.2	2	640	7.8
Barbiturates	234	3.5	49	4.0	5	5.7	31	5.3	19	6.2	1	339	3.8
Opiates	229	3.5	38	3.1	4	4.6	22	3.8	17	5.6	1	311	3.5
Speed	255	3.9	53	4.4	5	5.7	25	4.3	23	7.5	0	361	4.1
Stimulants	360	5.4	72	6.0	7	8.0	49	8.4	26	8.5	1	515	5.8
Tranquilizers	476	7.2	94	7.8	7	8.0	63	10.8	31	10.1	1	672	7.6
L.S.D.	450	6.8	96	7.9	10	11.5	53	9.1	23	7.5	3	635	7.2
Other Hallucinogens	407	6.2	86	7.1	10	11.5	36	6.2	24	7.8	4	567	6.4

TABLE 20

STUDENT DRUG USAGE BY MOTHER'S WORKING HOURS

	Day		Shift		Part Time		Other		No Work			Total	
	Students Reporting Using Each Drug At Least Once During Last Six Months												
	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	1361	53.1	203	47.8	712	54.6	428	51.8	1978	53.1	12	4694	52.9
Tobacco	769	30.0	145	34.1	406	31.1	247	29.9	1117	30.0	5	2689	30.3
Marihuana	383	14.9	54	12.7	191	14.6	112	13.5	541	14.5	1	1282	14.5
Glue	119	4.6	31	7.3	55	4.2	35	4.2	123	3.3	2	365	4.1
Other Solvents	200	7.8	52	12.2	85	6.5	65	7.9	233	6.3	5	640	7.2
Barbiturates	104	4.1	18	4.2	48	3.7	30	3.6	136	3.7	3	339	3.8
Opiates	92	3.6	20	4.7	59	4.5	25	3.0	115	3.1	0	311	3.5
Speed	111	4.3	20	4.7	59	4.5	34	4.1	137	3.7	0	361	4.1
Stimulants	159	6.2	23	5.4	63	4.8	53	6.4	216	5.8	1	515	5.8
Tranquilizers	195	7.6	31	7.3	108	8.3	65	7.9	270	7.2	3	672	7.6
L.S.D.	189	7.4	33	7.8	100	7.7	56	6.8	256	6.9	1	635	7.2
Other Hallucinogens	171	6.7	33	7.8	89	6.8	44	5.3	227	6.1	3	567	6.4

TABLE 21

STUDENT DRUG USAGE BY SIBLINGS' USE OF DRUGS

	Drugs Used By Siblings												
	Marihuana		Glue		Marihuana & Glue		Neither Marihuana nor Glue		Don't Know or No Siblings			Total	
	Students Reporting Using Each Drug At Least Once During Last 6 Months												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	595	81.7	51	57.3	110	74.8	2517	46.1	1411	58.7	10	4694	52.9
Tobacco	469	64.4	49	55.1	91	61.9	1255	23.0	822	34.2	10	2689	30.3
Marihuana	399	54.8	18	20.2	73	49.7	450	8.2	340	14.1	2	1282	14.5
Glue	31	4.3	17	19.1	34	23.1	140	2.6	136	5.7	7	365	4.1
Other Solvents	51	7.0	19	21.3	36	24.5	294	5.4	234	9.7	6	640	7.2
Barbiturates	80	11.0	6	6.7	29	19.7	122	2.2	99	4.1	3	339	3.8
Opiates	92	12.6	8	9.0	29	19.7	108	2.0	74	3.1	0	311	3.5
Speed	89	12.2	13	14.6	32	21.8	137	2.5	90	3.7	0	361	4.1
Stimulants	106	14.6	15	16.9	40	27.2	180	3.3	172	7.2	2	515	5.8
Tranquilizers	118	16.2	12	13.5	39	26.5	279	5.1	220	9.1	4	672	7.6
L.S.D.	170	23.4	11	12.4	45	30.6	248	4.5	160	6.7	1	635	7.2
Other Hallucinogens	112	15.4	10	11.2	38	25.9	260	4.8	143	5.9	4	567	6.4

TABLE 22

STUDENT DRUG USAGE BY MOTHER'S USE OF TOBACCO AND ALCOHOL

	Tobacco		Alcohol		Both		Neither		Don't Know			Total	
	Students Reporting Using Each Drug At Least Once During Last 6 Months												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	554	44.0	1250	66.2	1266	65.5	1465	43.1	143	41.0	16	4694	52.9
Tobacco	393	31.2	615	32.6	771	39.9	812	23.9	89	25.5	9	2689	30.3
Marihuana	156	12.4	322	17.0	378	19.6	384	11.3	39	11.2	3	1282	14.5
Glue	68	5.4	68	3.6	103	5.3	100	2.9	23	6.6	3	365	4.1
Other Solvents	93	7.4	126	6.7	165	8.5	213	6.3	38	10.9	5	640	7.2
Barbiturates	43	3.4	67	3.5	114	5.9	95	2.8	16	4.6	4	339	3.8
Opiates	36	2.9	70	3.7	101	5.2	74	2.2	26	7.4	4	311	3.5
Speed	51	4.1	80	4.2	109	5.6	91	2.7	26	7.4	4	361	4.1
Stimulants	77	6.1	111	5.9	158	8.2	139	4.1	27	7.7	3	515	5.8
Tranquilizers	94	7.5	161	8.5	191	9.9	193	5.7	29	8.3	4	672	7.6
L.S.D.	93	7.4	137	7.3	180	9.3	191	5.6	31	8.9	3	635	7.2
Other Hallucinogens	77	6.1	119	6.3	155	8.0	181	5.3	31	8.9	4	567	6.4

TABLE 23

STUDENT DRUG USAGE BY MOTHER'S USE OF STIMULANTS

RATE OF MOTHER'S USE

Students Reporting Using Each Drug At Least Once During Last 6 Months

DRUG	Never		Once Per Month		Once Per Week		Once Per Day		Don't Know			Total	
	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	3700	52.6	189	72.4	82	68.9	80	62.0	628	48.8	15	4694	52.9
Tobacco	2064	29.3	120	46.0	52	43.7	63	48.8	382	29.7	8	2689	30.3
Marihuana	990	14.1	59	22.6	33	27.7	35	27.1	164	12.8	1	1282	14.5
Glue	223	3.2	22	8.4	12	10.1	24	18.6	82	6.4	2	365	4.1
Other Solvents	395	5.6	37	14.2	20	16.8	32	24.8	149	11.6	7	640	7.2
Barbiturates	209	3.0	24	9.2	17	14.3	24	18.6	58	4.5	7	339	3.8
Opiates	206	2.9	18	6.9	15	12.6	19	14.7	47	3.7	6	311	3.5
Speed	246	3.5	12	4.6	17	14.3	18	14.0	61	4.7	7	361	4.1
Stimulants	316	4.5	48	18.4	27	22.7	32	24.8	86	6.7	6	515	5.8
Tranquilizers	455	6.5	56	21.5	28	23.5	33	25.6	97	7.5	3	672	7.6
L.S.D.	472	6.7	27	10.3	23	19.3	19	14.7	91	7.1	3	635	7.2
Other Hallucinogens	392	5.6	21	8.0	21	17.6	24	18.6	105	8.2	4	567	6.4

TABLE 24

STUDENT DRUG USAGE BY MOTHER'S USE OF BARBITURATES

	RATE OF MOTHER'S USE												
	Never		Once Per Month		Once Per Week		Once Per Day		Don't Know			Total	
	Students Reporting Using Each Drug At Least Once During Last 6 Months												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	3335	50.6	552	69.3	182	69.7	108	74.5	504	48.4	13	4694	52.9
Tobacco	1847	28.0	347	43.6	110	42.1	81	55.9	299	28.7	5	2689	30.3
Marihuana	842	12.8	187	23.5	75	28.7	47	32.4	128	12.3	3	1282	14.5
Glue	219	3.3	44	5.5	17	6.5	28	19.3	54	5.2	3	365	4.1
Other Solvents	392	5.9	83	10.4	21	8.0	39	26.9	101	9.7	4	640	7.2
Barbiturates	176	2.7	58	7.3	29	11.1	31	21.4	39	3.7	6	339	3.8
Opiates	185	2.8	45	5.7	20	7.7	25	17.2	29	2.8	7	311	3.5
Speed	220	3.3	49	6.2	23	8.8	27	18.6	37	3.6	5	361	4.1
Stimulants	282	4.3	94	11.8	33	12.6	37	25.5	64	6.1	5	515	5.8
Tranquilizers	373	5.7	110	13.8	70	26.8	42	29.0	72	6.9	5	672	7.6
L.S.D.	411	6.2	85	10.7	46	17.6	24	16.6	65	6.2	4	635	7.2
Other Hallucinogens	350	5.3	71	8.9	37	14.2	36	24.8	66	6.3	7	567	6.4

TABLE 25

STUDENT DRUG USAGE BY FATHER'S USE OF TRANQUILIZERS

DRUG	RATE OF FATHER'S USE Never		Once Per Month		Once Per Week		Once Per Day		Don't Know			Total	
	Students Reporting Using Each Drug At Least Once During Last 6 Months												
	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	3420	52.4	280	68.6	101	69.2	91	73.4	789	48.6	13	4694	52.9
Tobacco	1881	28.8	162	39.7	70	47.9	63	50.8	505	31.1	8	2689	30.3
Marihuana	890	13.6	100	24.5	43	29.5	42	33.9	205	12.6	2	1282	14.5
Glue	216	3.3	27	6.6	8	5.5	14	11.3	96	5.9	4	365	4.1
Other Solvents	416	6.4	30	7.4	23	15.8	21	16.9	146	9.0	4	640	7.2
Barbiturates	204	3.1	28	6.9	12	8.2	19	15.3	71	4.4	5	339	3.8
Opiates	193	3.0	25	6.1	12	8.2	19	15.3	56	3.4	6	311	3.5
Speed	239	3.7	30	7.4	8	5.5	15	12.1	64	3.9	5	361	4.1
Stimulants	311	4.8	48	11.8	23	15.8	26	21.0	103	6.3	4	515	5.8
Tranquilizers	349	5.3	94	23.0	44	30.1	45	36.3	136	8.4	4	672	7.6
L.S.D.	430	6.6	38	9.3	13	8.9	24	19.3	127	7.8	3	635	7.2
Other Hallucinogens	365	5.6	41	10.0	17	11.6	27	21.8	112	6.9	5	567	6.4

TABLE 26

STUDENT DRUG USAGE BY FATHER'S USE OF STIMULANTS

	RATE OF FATHER'S USE												
	Never		Once Per Month		Once Per Week		Once Per Day		Don't Know			Total	
	Students Reporting Using Each Drug At Least Once During Last 6 Months												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	3735	53.2	122	71.8	41	74.5	34	68.0	746	48.6	16	4694	52.9
Tobacco	2077	29.6	90	52.9	24	43.6	26	52.0	463	30.2	9	2689	30.3
Marihuana	1007	14.4	45	26.5	18	32.7	22	44.0	187	12.2	3	1282	14.5
Glue	213	3.0	31	18.2	11	20.0	16	32.0	91	5.9	3	365	4.1
Other Solvents	402	5.7	40	23.5	13	23.6	19	38.0	159	10.4	7	640	7.2
Barbiturates	212	3.0	28	16.5	7	12.7	16	32.0	67	4.4	9	339	3.8
Opiates	200	2.9	24	14.1	5	9.1	17	34.0	56	3.6	9	311	3.5
Speed	252	3.6	21	12.4	6	10.9	11	22.0	64	4.2	7	361	4.1
Stimulants	331	4.7	45	26.5	14	25.5	22	44.0	96	6.3	7	515	5.8
Tranquilizers	459	6.5	45	26.5	18	32.7	19	38.0	126	8.2	5	672	7.6
L.S.D.	482	6.9	28	16.5	7	12.7	11	22.0	102	6.6	5	635	7.2
Other Hallucinogens	397	5.7	29	17.1	9	16.4	17	34.0	108	7.0	7	567	6.4

TABLE 27

STUDENT DRUG USAGE BY FATHER'S USE OF BARBITURATES

	RATE OF FATHER'S USE												
	Never		Once Per Month		Once Per Week		Once Per Day		Don't Know			Total	
	Students Reporting Using Each Drug At Least Once During Last 6 Months												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	3573	51.8	277	72.5	97	74.6	56	73.7	683	50.3	8	4694	52.9
Tobacco	1980	28.7	166	43.5	66	50.8	41	53.9	429	31.6	7	2689	30.3
Marihuana	929	13.5	100	26.2	46	35.4	28	36.8	175	12.9	4	1282	14.5
Glue	232	3.4	23	6.0	13	10.0	16	21.1	78	5.7	3	365	4.1
Other Solvents	427	6.2	46	12.0	18	13.8	18	23.7	127	9.3	4	640	7.2
Barbiturates	218	3.2	26	6.8	17	13.1	17	22.4	56	4.1	5	339	3.8
Opiates	200	2.9	20	5.2	21	16.2	13	17.1	50	3.7	7	311	3.5
Speed	252	3.7	22	5.8	14	10.8	15	19.7	54	4.0	4	361	4.1
Stimulants	335	4.9	44	11.5	22	16.9	24	31.6	85	6.3	5	515	5.8
Tranquilizers	425	6.2	67	17.5	34	26.2	32	42.1	108	7.9	6	672	7.6
L.S.D.	458	6.6	39	10.2	24	18.5	14	18.4	96	7.1	4	635	7.2
Other Hallucinogens	398	5.8	36	9.4	24	18.5	18	23.7	86	6.3	5	567	6.4

TABLE 28

STUDENT DRUG USAGE BY OVERALL AVERAGE

	Average For All Subjects											
	40 or Less		41-50		51-65		66-75		76 or over			Total
	Reporting Using Each Drug At Least Once During Last 6 Months											
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	54	49.1	239	56.2	1669	60.9	1695	52.4	990	45.6	47	4691	52.9
Tobacco	44	40.0	185	43.5	1188	43.4	885	27.4	359	16.5	28	2689	30.3
Marihuana	26	23.6	98	23.1	569	20.8	411	12.7	175	8.1	3	1282	14.5
Glue	16	14.5	25	5.9	122	4.5	112	3.5	82	3.8	8	365	4.1
Other Solvents	20	18.2	41	9.6	199	7.3	210	6.5	152	7.0	18	640	7.2
Barbiturates	11	10.0	32	7.5	127	4.6	94	2.9	69	3.2	6	339	3.8
Opiates	14	12.7	38	8.9	116	4.2	81	2.5	56	2.6	6	311	3.5
Speed	17	15.5	42	9.9	137	5.0	82	2.8	74	2.9	9	361	4.1
Stimulants	12	10.9	35	8.2	213	7.8	160	5.0	89	4.1	6	515	5.8
Tranquilizers	19	17.3	40	9.4	238	8.7	229	7.1	136	6.3	10	672	7.6
L.S.D.	20	18.2	55	12.9	255	9.3	202	6.3	96	4.4	7	635	7.2
Other Hallucinogens	16	14.5	43	10.1	212	7.7	176	5.4	111	5.1	9	567	6.4

TABLE 29

STUDENT DRUG USAGE BY PARTICIPATION IN SCHOOL ACTIVITIES

	Number of Activities												
	None		One		Two		Three		Four			Total	
	Students Reporting Using Each Drug At Least Once During Last Six Months												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	1363	58.4	917	52.7	808	52.7	593	52.9	973	47.6	40	4694	52.9
Tobacco	892	38.2	522	30.0	426	27.8	313	27.9	509	24.9	27	2689	30.3
Marihuana	518	22.2	238	13.7	192	12.5	139	12.4	186	9.1	9	1282	14.5
Glue	88	3.8	62	3.6	51	3.3	62	5.5	96	4.7	6	365	4.1
Other Solvents	164	7.0	108	6.2	107	7.0	93	8.3	158	7.7	10	640	7.2
Barbiturates	126	5.4	56	3.2	49	3.2	38	3.4	63	3.1	7	339	3.8
Opiates	122	5.2	49	2.8	44	2.9	33	2.9	55	2.7	8	311	3.5
Speed	135	5.8	57	3.3	49	3.2	39	3.5	68	3.3	13	361	4.1
Stimulants	166	7.1	107	6.2	71	4.6	72	6.4	92	4.5	7	515	5.8
Tranquilizers	229	9.8	141	8.1	93	6.1	83	7.4	118	5.8	8	672	7.6
L.S.D.	248	10.6	122	7.0	90	5.9	67	6.0	103	5.0	5	635	7.2
Other Hallucinogens	196	8.4	110	6.3	80	5.2	58	5.2	113	5.5	10	567	6.4

TABLE 30

STUDENT DRUG USAGE BY ACTIVITIES AFTER SCHOOL

	Stay Home		Visit Friend		Organized Activities		Hang Around With Group		None of These			Total	
	Students Reporting Using Each Drug At Least Once During Last 6 Months.												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	1770	49.2	936	56.5	1025	48.6	583	65.8	339	63.0	41	4694	52.9
Tobacco	811	22.6	684	41.3	429	20.3	521	58.8	220	40.9	24	2689	30.3
Marihuana	387	10.8	335	20.2	184	8.7	236	26.6	126	23.4	14	1282	14.5
Glue	98	2.7	74	4.5	55	2.6	104	11.7	26	4.8	8	365	4.1
Other Solvents	188	5.2	136	8.2	100	4.7	158	17.8	46	8.6	12	640	7.2
Barbiturates	100	2.8	58	3.5	45	2.1	89	10.0	41	7.6	6	339	3.8
Opiates	76	2.1	59	3.6	43	2.0	82	9.3	41	7.6	10	311	3.5
Speed	94	2.6	76	4.6	53	2.5	85	9.6	43	8.0	10	361	4.1
Stimulants	122	3.4	114	6.9	77	3.6	143	16.1	48	8.9	11	515	5.8
Tranquilizers	227	6.3	148	8.9	107	5.1	121	13.7	57	10.6	12	672	7.6
L.S.D.	158	4.4	157	9.5	94	4.5	150	16.9	66	12.3	10	635	7.2
Other Hallucinogens	161	4.5	128	7.7	87	4.1	122	13.8	55	10.2	14	567	6.4

TABLE 31

STUDENT DRUG USAGE BY ACTIVITIES ON WEEKENDS

Students Reporting Using Each Drug At Least Once During Last 6 Months.

	Stay Home		Visit Friend		Hang Around With Group		Other			Total	
DRUG	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	758	31.8	2098	59.8	1260	75.2	540	44.3	38	4694	52.9
Tobacco	218	9.1	1129	32.2	1047	62.5	276	22.6	19	2689	30.3
Marihuana	41	1.7	495	14.1	621	37.1	112	9.2	13	1282	14.5
Glue	75	3.1	97	2.8	140	8.4	46	3.8	7	365	4.1
Other Solvents	130	5.5	192	5.5	221	13.2	87	7.1	10	640	7.2
Barbiturates	35	1.5	96	2.7	148	8.8	52	4.3	8	339	3.8
Opiates	25	1.0	76	2.2	159	9.5	43	3.5	8	311	3.5
Speed	26	1.1	100	2.8	174	10.4	50	4.1	11	361	4.1
Stimulants	41	1.7	158	4.5	245	14.6	62	5.1	9	515	5.8
Tranquilizers	95	4.0	272	7.7	217	13.0	82	6.7	6	672	7.6
L.S.D.	39	1.6	197	5.6	311	18.6	80	6.6	8	635	7.2
Other Hallucinogens	72	3.0	186	5.3	224	13.4	75	6.2	10	567	6.4

TABLE 32

STUDENT DRUG USAGE BY NUMBER OF PERSONS WHO WOULD SUPPLY MARIHUANA

	Persons Who Would Supply Marihuana												
	None		One		Two		Three		Four or More		Total		
	Students Reporting Using Each Drug At Least Once During Last 6 Months												
DRUG	No.	%	No.	%	No.	%	No.	%	No.	%	Blanks	No.	%
Alcohol	1399	31.4	370	53.9	440	68.6	340	72.3	2127	82.2	15	4694	52.9
Tobacco	525	11.8	178	25.9	213	33.2	189	40.2	1572	60.7	12	2689	30.3
Marihuana	34	0.8	24	3.5	48	7.5	58	12.3	1113	43.0	5	1282	14.5
Glue	117	2.6	28	4.1	38	5.9	27	5.7	151	5.8	4	365	4.1
Other Solvents	266	6.0	55	8.0	46	7.2	44	9.4	225	8.7	4	640	7.2
Barbiturates	46	1.0	14	2.0	19	3.0	20	4.3	236	9.1	4	339	3.8
Opiates	39	0.9	11	1.6	11	1.7	8	1.7	240	9.3	2	311	3.5
Speed	55	1.2	5	0.7	12	1.9	15	3.2	271	10.5	3	361	4.1
Stimulants	66	1.5	23	3.4	38	5.9	34	7.2	352	13.6	2	515	5.8
Tranquilizers	131	2.9	42	6.1	70	10.9	42	8.9	384	14.8	3	672	7.6
L.S.D.	63	1.4	16	2.3	17	2.7	21	4.5	516	19.9	2	635	6.7
Other Hallucinogens	150	3.4	19	2.8	29	4.5	12	2.6	354	13.7	3	567	6.4

TABLE 33

YEAR FIRST USED ALCOHOL, MARIHUANA AND GLUE

	Alcohol		Marihuana		Glue	
Year First Used	No.	%	No.	%	No.	%
1970	342	8	310	21	101	22
1969	687	15	615	43	131	28
1967-68	1377	31	371	26	137	30
1965-66	756	17	100	7	42	9
1964 or earlier	1357	29	51	4	51	11
Total Users	4519	100	1447	101	462	100

TABLE 34

REASONS FOR STOPPING USE OF ALCOHOL, MARIHUANA AND GLUE

	Marihuana		Alcohol		Glue	
Reason	No.	%	No.	%	No.	%
Might be Harmful or Addicting	159	11	278	7	162	37
Parents or Others Forced Me to Stop	36	3	79	2	27	5
My Friends Wanted Me to Stop	40	3	47	1	39	9
Not Interested in Using Anymore	293	21	773	19	134	30
Have Not Stopped	868	62	2831	71	87	19
Total Users	1396	100	4008	100	449	100

TABLE 35

PARENTAL KNOWLEDGE OF USE OF ALCOHOL, MARIHUANA AND GLUE

	Alcohol		Marihuana		Glue	
Parents Knowledge	No.	%	No.	%	No.	%
Don't Know I Use	1108	28	1018	75	282	67
Don't Know I Use as Much as I Do	630	16	118	9	40	10
Know and Want Me To Stop	276	7	130	10	57	14
Know and OK It	1802	47	74	5	31	7
No Reply or No Parents	79	2	19	1	12	3
Total Users	3895	100	1359	100	422	101

TABLE 36

EXCLUSIVE DRUG USER TYPOLOGIES

DRUG	NUMBER	%
None	3,383	38.2
Alcohol only	1,929	21.8
Tobacco only	343	3.9
Alcohol and tobacco only	919	10.4
Psychoactive drugs only	79	.9
Illicit drugs only	48	.5
Glue and solvents only	126	1.4
Alcohol and psychoactive only	152	1.7
Alcohol and illicit only	189	2.1
Alcohol and solvents only	144	1.6
Tobacco and psychoactive only	11	.1
Tobacco and Illicit only	70	.8
Tobacco and solvents	30	.3
Alcohol, tobacco and psychoactive only	150	1.7
Alcohol, tobacco and illicit only	507	5.8
Alcohol, tobacco and solvents only	92	1.0
Other combinations	693	7.8
Total	8,865	100.0

TABLE 37

CHI SQUARES OF RELATIONSHIP BETWEEN STUDENT ALIENATION SCORES AND PERSONAL USAGE OF VARIOUS DRUGS

DRUGS	Powerlessness	Social Isolation	Normlessness	Alienation
Alcohol	33.0*	33.8*	77.4*	48.9*
Tobacco	82.7*	37.7*	96.4*	69.6*
Marihuana	45.1*	22.2	93.3*	56.6*
Glue	48.9*	26.7*	67.0*	48.9*
Other Solvents	60.0*	28.8*	88.0*	78.2*
Barbiturates	28.9*	34.6*	51.8*	42.7*
Opiates	16.6	11.1	42.2*	25.2*
Speed	15.3	20.3	52.3*	23.1
Stimulants	48.1*	17.9	96.5*	53.9*
Tranquilizers	44.4*	64.4*	46.3*	73.0*
L.S.D.	22.8	17.0	58.9*	27.9*
Other Hallucinogens	25.6*	23.2	42.6*	26.6*

* Significantly related at .05 level with 15 d.f.

TABLE 38

CHI SQUARES OF RELATIONSHIP BETWEEN STUDENT ALIENATION SCORES AND PARENTAL USE OF VARIOUS DRUGS

DRUGS	Powerlessness	Social Isolation	Normlessness	Alienation
<u>Fathers' Use</u>				
Alcohol and Tobacco	21.1	15.0	27.3*	24.7
Tranquilizers	33.5*	48.3*	45.1*	48.9*
Stimulants	36.6*	24.1	57.2*	61.2*
Barbiturates	28.8*	39.4*	35.6*	39.8*
<u>Mothers' Use</u>				
Alcohol and Tobacco	18.0	25.8*	22.3	31.8*
Tranquilizers	53.5*	92.2*	50.6*	80.3*
Stimulants	71.7*	35.4*	60.9*	96.8*
Barbiturates	44.4*	49.9*	58.7*	73.5*

* Significantly related at .05 level with 15 d.f.

Appendix 3

STUDENT QUESTIONNAIRE ABOUT DRUG USE

STUDENT QUESTIONNAIRE ABOUT DRUG USE

This survey is an attempt to find out the knowledge, attitudes and practices of students with respect to drugs.

Your answer sheet will be anonymous and strictly confidential. Do not sign your name. There is no way your individual answer sheet can ever be identified. The page will be scored by machine and then destroyed.

INSTRUCTIONS:

A. You need 3 things
   (a) The Question Booklet
   (b) The Answer Sheet
   (c) A pencil and a rubber

B. (a) The questions are numbered 1, 2, 3, 4, etc.
   (b) The answer choices to each question are lettered

   A, B, C, D, or E

C. For every question mark ONE and ONLY ONE answer choice.

   Choose the ONE right or the best or the closest answer for you.

D. These are the STEPS IN ANSWERING:

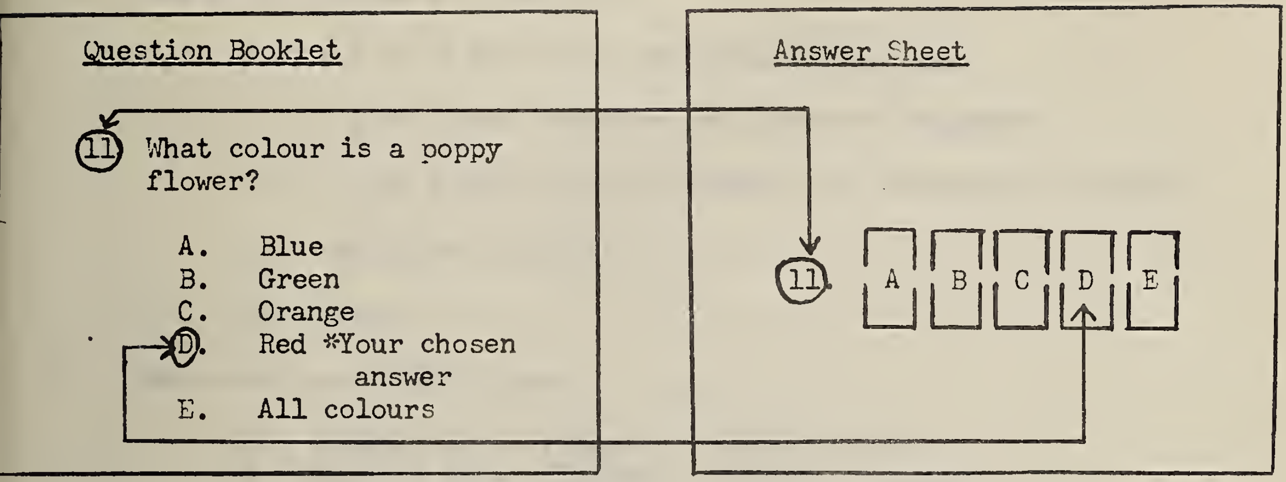
   1. Read the question CAREFULLY.

   2. Read all the answer choices. Some are tricky or require thinking.

   3. (i) Match the question numbers in the QUESTION BOOKLET and ANSWER SHEET.

      (ii) Match the LETTER beside your chosen answer with the same LETTER on the ANSWER SHEET.

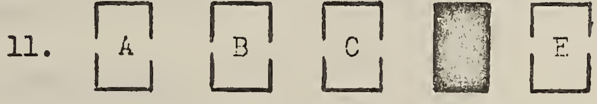
For Example:



⑪ What colour is a poppy flower?

A. Blue
B. Green
C. Orange
D. Red *Your chosen answer
E. All colours

4. Mark the LETTER on the ANSWER SHEET THIS WAY



5. If you make a mistake (mark the wrong letter or mark the wrong question):
   (i) Rub the mistake out <u>completely</u>
   (ii) Mark the right letter

1. Which group contains your age? Mark the letter of that group on your answer sheet. (for example, if your age is 13 years - mark 1(B).)

   A. 10 years or under
   B. 11 or 12 or 13 years old
   C. 14 or 15 or 16 years old
   D. 17 or 18 or 19 years old
   E. 20 or over

2. If you are a boy mark A.
   If you are a girl mark E.

3. Are you presently a student in:

   A. a 4 or 5 year Arts and Science Programme

   B. a 4 or 5 year Business and Commerce Programme

   C. a 4 or 5 year Science, Trades, and Technology Programme

   D. any 2 year programme

   E. other

4. Where was your FATHER born?

   A. North America (Canada, United States)
   B. British Isles (England, Ireland, Scotland)
   C. Europe (France, Germany, Greece, Italy, Austria, Scandinavia and others)
   D. Poland, Czechoslovakia, Hungary, Russia
   E. Elsewhere

5. Where was your MOTHER born?

   A. North America (Canada, United States)
   B. British Isles (England, Ireland, Scotland)
   C. Europe (France, Germany, Greece, Italy, Austria
   D. Poland, Czechoslovakia, Hungary, Russia
   E. Elsewhere

6. What LANGUAGE do your PARENTS speak MOST OF THE TIME?

   A. English only
   B. Italian, Portuguese, Spanish
   C. Jewish, Hebrew
   D. German, French, Scandinavian Languages
   E. None of these

7. Parents' Language continued: (you MUST answer this question also)

   A. None of these
   B. Chinese or Japanese
   C. Polish, Czechoslovakian, Hungarian, Rumanian, Ukrainian, Russian, Greek

8. What is your FAMILY RELIGION? (Religion practised in your home)

   A. Catholic
   B. Protestant (Anglican, Presbyterian, United,Baptist, etc.)
   C. Jewish
   D. No Religion; or I don't know
   E. Other

9. Are you:

   A. Living with both parents
   B. Living with mother only
   C. Living with father only
   D. Living in other arrangements(sister, uncle, alone, etc.)

10. When does your FATHER (Male Guardian) work?

   A. Father works all day (day-time)
   B. Father works shifts or evenings
   C. Father works part-time
   D. None of these; other
   E. My father is not working now

11. When does your MOTHER work?

   A. My Mother works all day (day-time)
   B. My Mother works shifts or evenings
   C. Mother works part-time
   D. None of these; other
   E. My mother is not working now

12. What kind of work does your FATHER do?

NOTE: 1. If your FATHER does not work - or
2. you have no FATHER - mark BOTH A and E on Answer sheet.

   A. Professional and Managerial (Doctor, Teacher, Manager, Architect, Engineer)
   B. Proprietor (store or small business owner)
   C. Clerical or Sales (Bookkeeper, secretary, office work, salesman)
   D. Skilled or Technical (Mechanic, Electrician, Baker, Machine operator)
   E. Semiskilled (Construction, driving, shipping, general labour)

13. What is your usual overall average for ALL subjects this year?

   A. under 40
   B. 40 - 50
   C. 50 - 65
   D. 65 - 75
   E. 75 or over

14. Do you have any OLDER brothers or sisters?

    A. I am the only child
    B. I am the oldest child
    C. I have 1 older brother
    D. I have 1 older sister
    E. Other

15. How much money do you have to spend each WEEK (from job, allowance, etc.)

    A. 50¢ or less
    B. 51¢ to $2
    C. $2.01 to $5
    D. $5.01 to $10
    E. over $10 a week

16. Have any of your BROTHERS or SISTERS taken Marihuana or sniffed glue?

    A. The've used marihuana only
    B. They've used glue only
    C. They've used both marihuana and glue
    D. They've never used marihuana or glue
    E. I don't know - or - I have no brothers or sisters

17. What does your FATHER (Male Guardian) use?

    A. tobacco only
    B. alcohol only
    C. tobacco and alcohol
    D. neither tobacco nor alcohol
    E. I don't know - or - I have no father

18. What does your MOTHER use?

    A. tobacco only
    B. alcohol only
    C. tobacco and alcohol
    D. neither tobacco nor alcohol
    E. I don't know - or - I have no mother

19. How many persons do you know who would give you or sell you MARIHUANA?

    A. no one
    B. one person
    C. two people
    D. three people
    E. four people or more

20. Does your MOTHER use tranquilizers?

    A. never

    B. less than once a month

    C. every week but not every day

    D. nearly every day

    E. I don't know - or - I have no mother

21. Does your FATHER use tranquilizers?

    A. never

    B. less than once a month

    C. every week but not every day

    D. nearly every day

    E. I don't know - or - I have no father

22. Does your MOTHER use stimulants or pep pills?

    A. never

    B. less than once a month

    C. every week but not every day

    D. nearly every day

    E. I don't know - or - I have no mother

23. Does your FATHER use stimulants or pep pills?

    A. never

    B. less than once a month

    C. every week but not every day

    D. nearly every day

    E. I don't know - or - I have no father

24. Does your MOTHER use barbiturates or sleeping pills?

A. never

B. less than once a month

C. every week but not every day

D. nearly every day

E. I don't know - or - I have no mother

25. Does your FATHER use barbiturates or sleeping pills?

A. never

B. less than once a month

C. every week but not every day

D. nearly every day

E. I don't know - or - I have no father

26. In the past six months (since November) I have used TOBACCO:

A. not at all
B. 1 to 5 cigarettes per week
C. 6 to 10 cigarettes per week
D. 11 to 20 cigarettes per week
E. 20 cigarettes or over per week or regular user

27. In the past six months (since November) I have used ALCOHOL (wine, beer, whiskey, gin, etc.):

A. not at all
B. less than once per month
C. about twice per month
D. about three times per month
E. about four or more times per month

28. In the past six months (since November) I have used MARIHUANA:

A. not at all
B. one or two times
C. three or four times
D. five or six times
E. seven or more times

29. In the past six months (since November) I have sniffed GLUE:

    A. not at all
    B. one or two times
    C. three or four times
    D. five or six times
    E. seven or more times

30. In the past six months (since November) I have sniffed other SOLVENTS (i.e., nail polish remover, paint thinner, gasoline, etc.):

    A. not at all
    B. one or two times
    C. three or four times
    D. five or six times
    E. seven or more times

31. In the last six months (since November) I have used BARBITURATES: (seconal, amytal, phenobarb)

    A. not at all
    B. one or two times
    C. three or four times
    D. five or six times
    E. seven or more times

32. In the past six months (since November) I have used OPIATES (heroin, morphine, opium):

    A. not at all
    B. one or two times
    C. three or four times
    D. five or six times
    E. seven or more times

33. In the past six months (since November) I have used "SPEED":

    A. not at all
    B. one or two times
    C. three or four times
    D. five or six times
    E. seven or more times

34. In the past six months (since November) I have used STIMULANTS (other than "speed," i.e., pep pills):

    A. not at all
    B. one or two times
    C. three or four times
    D. five or six times
    E. seven or more times

35. In the past six months (since November) I have used TRANQUILIZERS:

A. not at all
B. one or two times
C. three or four times
D. five or six times
E. seven or more times

36. In the past six months (since November) I have used LSD:

A. not at all
B. one or two times
C. three or four times
D. five or six times
E. seven or more times

37. In the past six months (since November) I have used OTHER HALLUCINOGENS (STP, or others)

A. not at all
B. one or two times
C. three or four times
D. five or six times
E. seven or more times

If you have NOT used either:

ALCOHOL
MARIHUANA or
GLUE

in the past six month, then SKIP to question #48.

If you have not used alcohol in the past six months, SKIP to question #42

38. When did you have your first DRINK of alcohol (beer, wine, or liquor)?

A. this year - 1970
B. last year - 1969
C. two or three years ago - 1967 - 68
D. four or five years ago - 1965 - 66
E. over five years ago - 1964 or before

39. When would you most likely drink?

    A. usually when I'm alone
    B. when I'm with my close friends
    C. before, during or after a party
    D. anywhere away from home
    E. anytime outside of school - does not matter

40. If you have used ALCOHOL but have stopped, which of the following comes closest to your reason for stopping?

    A. thought it might be harmful or addictive
    B. my parents or others forced me to stop
    C. my friends wanted me to stop
    D. I'm no longer interested in drinking
    E. I have not stopped

41. How much do your parents know about your drinking?

    A. they don't know I drink
    B. they don't know I drink as much as I do
    C. they know I drink and want me to stop
    D. they know I drink and OK it
    E. I do not live with my parents

If you have not used marihuana in the past six months, SKIP to question #45.

42. When did you first use MARIHUANA?

    A. this year - 1970
    B. last year - 1969
    C. two or three years ago - 1967-68
    D. four or five years ago - 1965-66
    E. over five years ago - 1964 or before

43. If you have used MARIHUANA but have stopped, which one of the following comes closest to your reason for stopping?

    A. thought it might be harmful or addictive
    B. my parents or others forced me to stop
    C. my friends wanted me to stop
    D. I'm not interested in using marihuana any more
    E. I have not stopped using marihuana

44: How much do your parents know about your using MARIHUANA?

A. they don't know I use marihuana
B. they don't know I use as much marihuana as I do
C. they know I use marihuana and they want me to stop
D. they know I use marihuana and they OK it
E. I have no parents

If you have NOT sniffed GLUE in the past six months, SKIP to question #48

45. When did you first sniff GLUE?

A. this year - 1970
B. last year - 1969
C. two or three years ago - 1967-68
D. four or five years ago - 1965-66
E. over five years ago - 1964 or before

46. If you have sniffed GLUE but have stopped which one of the following comes closest to your reason for stopping?

A. thought it might be harmful or addicting
B. my parents or others forced me to stop
C. my friends wanted me to stop
D. I'm not interested in using glue anymore
E. I have not stopped using glue

47. How much do your parents know about your using GLUE?

A. they don't know I use glue
B. they don't know I use as much glue as I do
C. they know I use glue and want me to stop
D. they know I use glue and OK it
E. I have no parents

48. Which one of the following is most like your reason for NOT using drugs?

A. drugs are dangerous to my health
B. drugs are illegal
C. my parents don't approve of my using drugs
D. I have other things I enjoy doing
E. I use drugs

THE REMAINING ARE SINGLE QUESTIONS i.e. MAKE ONE ANSWER FOR EACH QUESTION

49. Which substance in this list causes the GREATEST HARM when used a lot?

    A. Cigarettes
    B. Marihuana
    C. Glue
    D. Alcohol
    E. Other-or-any of these

50. What does the term GRASS refer to?

    A. Money in Yorkville
    B. Marihuana
    C. Indian Tobacco
    D. LSD
    E. Other-or-none of these

51. How much money does a 'dime bag' of marihuana cost?

    A. $1.00
    B. $ .10
    C. $100.00
    D. $10.00
    E. Other-or-none of these

52. Which one of these would most influence your decision to take or not to take drugs.

    A. The information you get at school
    B. What your parents tell you about drugs
    C. Television, books, or newspaper information
    D. Your family doctor
    E. What your friends tell you about drugs

53. Have you ever been in a group where OTHER PEOPLE used drugs (marihuana, glue, LSD, etc.) and you did not use them

    A. I have never been at a party where there were drugs present
    B. I have been at drug parties but I do not use drugs myself
    C. At parties with drugs, I use drugs

54. How often have you been at a party where drugs (marihuana, glue, LSD, etc.) were used

    A. Never
    B. One or two times
    C. Three to five times
    D. Six to ten times
    E. Over ten times

55. From which of the following sources have you learned MOST of what you know about drugs?

    A. From my family
    B. From the kids I hang around with
    C. From my church or school
    D. From the T.V., radio, newspaper
    E. From my own experiences with drugs

56. What do you most often do in the evening AFTER SCHOOL?

    A. Stay at home, read, watch T.V., etc.
    B. Go to a friend's house, go out with a friend
    C. Activities (sports, music, clubs)
    D. Go out or hang around with a group of kids
    E. None of these

57. What do you do most often on WEEKEND EVENINGS?

    A. Stay at home, read, watch T.V., etc?
    B. Go to a friend's house, go out with a friend (movies, dances)
    C. Go out and hang around with a group of kids (parties, dances)
    E. None of these

58. In school how many activities (if any) do you take part in this year? i.e. (sports, band)

    A. No activity
    B. One activity
    C. Two activities
    D. Three activities
    E. Four or more activities

THE NEXT SHEET SHOULD BE A PINK ONE. ANSWERS TO THE QUESTIONS ON THE PINK SHEET GO DIRECTLY ON THAT SHEET AND NOT ON THE ANSWER SHEETS.

Please mark the answer that best describes the way you feel about each statement. Mark you answers on the answer sheet starting with the answer to qeustion 59.

59. Sometimes I feel all alone in the world

    a) Strongly agree

    b) Agree

    c) Undecided

    d) Disagree

    e) Strongly disagree

60. I worry about what the future holds for my generation.

    a) Strongly agree

    b) Agree

    c) Undecided

    d) Disagree

    e) Strongly disagree

61. I don't get invited out by friends as often as I'd really like.

    a) Strongly agree

    b) Agree

    c) Undecided

    d) Disagree

    e) Strongly disagree

62. The end often justifies the means.

    a) Strongly agree

    b) Agree

    c) Undecided

    d) Disagree

    e) Strongly disagree

63. Not many people really feel lonely.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

64. Sometimes I have the feeling that other people take advantage of me.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

65. There are very few things in life you can really depend on.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

66. Real friends are easy to find.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

67. It is frightening to be responsible for someone else.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

68. There just aren't any definite rules to live by.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

69. One can always find friends if he is friendly himself.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

70. I often wonder what the meaning of life really is.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

71. I doubt that I will ever be able to do anything to prevent a major "shooting war."

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

72. The world is basically a friendly place.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

73. I have so many decisions to make that I could just "blow up".

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

74. The only thing one can be sure of is that he can be sure of nothing.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

75. There are few dependable ties between people.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

76. It's who you know, not what you know, that counts.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

77. There are so many religions that you don't really know which to believe.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

78. People have to conform so much that there's not much room for choice.

a) Strongly agree

b) Agree

c) Undecided

d) Disagree

e) Strongly disagree

79. We are just so many cogs in the machinery of life.

    a) Strongly agree

    b) Agree

    c) Undecided

    d) Disagree

    e) Strongly disagree

80. People are just naturally friendly and helpful.

    a) Strongly agree

    b) Agree

    c) Undecided

    d) Disagree

    e) Strongly disagree

81. The future looks very dismal.

    a) Strongly agree

    b) Agree

    c) Undecided

    d) Disagree

    e) Strongly disagree

82. I don't get to visit friends as often as I'd really like.

    a) Strongly agree

    b) Agree

    c) Undecided

    d) Disagree

    e) Strongly disagree